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**The Art of Medicine: A Narrative Case Study of an Art
Museum Workshop Series for First-Year Medical Students**

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**The Art of Medicine: A Narrative Case Study of an Art
Museum Workshop Series for First-Year Medical Students**

by

Carolyn Claire Anderson

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Dedication

For my parents, who fill me with unconditional love, encouragement, and joy.

I truly could not have done this without you.

And for Mumommy, who inspired my interest in the connections between art and mental health.

I love and miss you very much.

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Abstract

The Art of Medicine: A Narrative Case Study of an Art Museum Workshop Series for First-Year Medical Students

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Utilizing a narrative case study methodology, this research examines stakeholders' experiences of a repeat-visit workshop at the Blanton Museum of Art for first-year students of the Dell Medical School at The University of Texas at Austin. The workshop aims to nurture students' skills in visual literacy, self-care, and empathetic communication so that they are better prepared in their undertakings as medical students and future doctors. The workshop's key stakeholders include art museum educators from the Blanton Museum of Art, faculty of the Dell Medical School, and first-year Dell Medical School student participants in the workshop. Through direct observation and semi-structured interviews, this research uncovered meaningful insights surrounding the motivations, implementation, and impacts of the workshop from the perspectives of key stakeholders. By analyzing the value that key stakeholders ascribe to their experiences of the workshop, this study demonstrates the educational value of art museum experiences in medical education and one museum's commitment to community and societal wellbeing.

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Chapter 1: Introduction to the Study

Over the last few years, I discovered that my passion for art museum education primarily lies in working with people. Meeting, encouraging and interacting with people's unique personalities and facilitating personal and lasting connections to artwork are the greatest joys of my life and, fortunately, my chosen profession. The arts are uniquely suited as a means of connecting with people as they embody the human experience—something to which all humans can relate. As a result, the arts are a tool that can be utilized to engage students in learning about a variety of concepts and disciplines related to the human experience. Unfortunately, however, the arts have entered a period in which their educational potential is largely ignored or misunderstood. Furthermore, art institutions—such as museums—do not have a long history of encouraging and building meaningful connections with the diverse audiences that make up their communities, further muddying their educational potential. In response, more and more museums are embracing their social responsibilities and using art education as a means of addressing needs and issues within their communities. Through these efforts, groups previously underserved by museums are learning through arts and, in establishing this connection, art museums are strengthening their relevance within their communities.

The purpose of this thesis is to investigate how key stakeholders value a repeat-visit workshop at the Blanton Museum of Art intended for first-year students of the Dell Medical School at The University of Texas at Austin in its second, post-pilot year (Fall 2017-Spring 2018). The workshop aims to nurture students' skills in visual literacy, empathetic communication, and self-care so that they are better prepared in their undertakings as medical students and future doctors. The workshop's key stakeholders include art museum educators from the Blanton Museum of Art, faculty from the Dell

Medical School, and first-year Dell Medical School student participants in the workshop. By analyzing the value that key stakeholders ascribe to their experiences of the workshop, this study helps the reader understand the educational value of art museum experiences in medical education. Furthermore, this study culminates into a narrative discussion of how, through this workshop, the Blanton Museum of Art is continuing to evaluate and improve its commitment and value of community and societal wellbeing.

Through semi-structured interviews, questionnaires and direct observations, I gathered information surrounding key stakeholders' experiences and perceptions of the workshop. Content analysis of the data collected revealed five themes surrounding how key stakeholders value the multi-visit workshop: (a) Tangible product; (b) Focus on emotion; (c) Ambiguity; (d) Process orientation; e) Connection. Initially proposed and described by psychologist and founder of the Arts in Education Program at Harvard University Jessica Hoffman Davis (2008) as the unique features of the arts in education, these five themes were expressed in stakeholders' evaluations of the workshops—as observed by me during the workshops and/or as expressed by the stakeholders themselves in interviews after the workshop's conclusion.

It is my hope that this case study sheds light on two larger themes behind this study: (a) the value of the arts to a variety of disciplines and professions and, (b) the value of art museums, which through collaborative programming, have potential to address a wide range of needs within the communities they serve. Due to the recent decline in arts funding, the following study and its more macro-implications are significant to the field of art education. Establishing art museums as institutions which provide personally and professionally valuable experiences for healthcare professionals will further weaken the pervasive opinion that the arts—especially art museums and

programming—are not necessary and do not serve audiences situated outside of the “art world” (Anderson, 2004).

CENTRAL RESEARCH QUESTION

This study was driven by the following central research questions:

How do key stakeholders perceive the value of a collaborative, three-part workshop between the Dell Medical School and Blanton Museum of Art? What role does the museum environment play in the stakeholders’ perceptions of the workshop’s value?

PROBLEM STATEMENT

“To attend those who suffer, a physician must possess not only the scientific knowledge and technical abilities, but also an understanding of human nature.... One of the essential qualities of the clinicians is interest in humanity, for the secret of the care of the patients is in caring for the patient” (Hellín, 2002, pp. 450-454). This understanding of human nature is considered a creative ability, an art, or even some form of magic that is vital to the development of the patient-physician relationship (Hall, Roter & Rand, 1981). Only in the last few decades have medical educators begun to understand their social responsibility to teach their students—prospective physicians—to recognize the immense value of humanism in medicine (Lombardi, 2016). Concepts such as ethics, altruism, empathy, and professionalism are necessary for the establishment of effective patient-physician relationships on which, recent research has shown, the diagnosis and treatment are directly dependent (Hellín, 2002).

However, because humanism is still a relatively new concept in the field of medical education, medical students for decades have gone without the humanistic training necessary to maintain effective doctor-patient relationships. As a result, problems such as declines in physical diagnostic skills, burnout, erosion of empathy, lack of

communication, and ultimately, poor patient care have become pervasive throughout the medical profession.

A study by Naghshineh et al. (2008) reports that the physical examination skills of medical students, residents, and practicing physicians has reached a point of “substantial inadequacy” and, despite this fact, the teaching of such skills continues to decline (p. 991). As a result, doctors are replacing “fundamental bedside procedures, such as “inspection” with “expensive laboratory tests and radiological studies” (p. 991). Johnson (2010) states that, “the diagnostic skills of medical students can potentially be improved through education involving the visual arts, specifically through the teaching of ‘visual literacy’” (p. 15). Visual literacy, or the ability to find meaning in imagery, is taught and developed among participants (Housen, 2002) and, if applied to the work of physicians, could potentially improve the quality and lower cost of contemporary health care (Naghshineh et al., 2008, p. 991). When efforts have been made to incorporate visual literacy development into clinical training, the results from such courses have been promising even when teaching methods are limited (Jasani & Saks, 2013; Naghshineh et al., 2008; Rentmeester & Severson, 2014).

“Physician burnout affects over 50% of physicians in training and early clinical practice” (Gooding et al., 2016, p. 123). Symptoms of burnout include “emotional exhaustion, detachment from others, and a reduced sense of personal accomplishment” and are most common during medical school, training, and the early years of medical practice (Dyrbye, 2014, p. 443). As a result, burnout can adversely affect physician competency and professionalism, leading to an increased risk of depression and a higher likelihood of poor patient care (Dyrbye, 2014, p. 443; Gooding et al., 2016, p. 123). Dyrbye et al. (2014) urge for improved physician well-being at all career stages, yet their study offers little to no recommendations for doing so (p. 447). Research has shown

short-term effects of visual arts-based teaching methods are effective in fostering connection between medical students and enhancing their “reflective capabilities... [providing] residents with an important touchstone for challenging days at work and emotional encounters with patients and colleagues” (Gooding et al., 2016, p. 127). However, at the time of this research, there is little qualitative data regarding the value or effectiveness of visual arts-based teaching methods in relieving physician burnout and improving visual literacy. Furthermore, additional research is necessary to encourage other health care and arts institutions to generate partnerships “to enhance the well-being of the healthcare workforce” and potentially improve these problems within the communities they serve (Camic & Chatterjee, 2013, p. 69; see also Gooding et al., 2016; Rentmeester & Severson, 2014).

Finally, this study addresses the problem of declines in arts funding, most specifically within art museums. Within the current political climate, there is a pervasive belief that arts are not as necessary or relevant as other subjects such as math and science. The attitude is also felt toward public arts institutions, such as museums. However, this thesis aims to clarify the misunderstanding of the potential benefits that arts integration (and/or arts intervention) and art museums have to offer to the medical field. Furthermore, in presenting an example of one museum workshop that addresses a widespread community problem, this thesis aims to shed light on how one museum is embracing community partnerships in order to increase its relevance and value.

MOTIVATIONS FOR RESEARCH

Personal

Having grown up in Fort Worth, Texas, my many childhood trips to the city’s various art museums are largely responsible for my belief in the positive and lasting

impact that art can have on individuals and communities. At an early age it became clear to me how art—both viewing and making—could make me *feel* better. I followed this initial interest in my pursuit of an undergraduate degree in psychology with the intention of one day becoming an art therapist. However, during an internship for a modern art museum, I discovered my attachment to the museum environment. The quietness, natural light, and works of art that hung on the clean, white walls of the modern and contemporary art museums I frequented resonated with me. I now believe that those museum environments satisfied a subconscious craving for a peaceful respite from the louder outside world. However, I also felt the museum was not a vacuum, not a place completely removed from the world outside. Instead, I always felt as though they were places where I gained clarity in my thoughts, ideas, and emotions. I could pace the galleries until a particular object spoke to me and consider why, what it means and, more importantly, what it means to me and how it connects to the world around me. I became fascinated by the museum as a space for not only learning, but for healing and for connecting with others. A continued exposure to art has led to growth and development in many aspects of my life, both personal and professional, deepening my interest in the overlaps between art and health.

Professional

My academic interests as a museum-based art educator is also supported by this research. It provided an opportunity to explore one model for collaboration between two typically disparate institutions: an art museum and a medical school. Art can serve many people, solve many problems, and address many needs. Since beginning my graduate work, I have become aware of the fact that museums must consistently be aware of,

address, and reevaluate the needs of their small- and large-scale communities in order to establish and maintain relevance and value.

This study appeals to the notion that medical schools are a community in need. As medical students who go on to become practicing physicians continue to experience burnout, empathy erosion, and declines in physical diagnostic abilities, many others within the community are negatively affected. As a concerned community member and as a future museum educator, this study is one way in which I can call attention to this issue and shed light on a unique workshop that addresses the needs of a specific community—medical students—and, in doing so, serves the greater public. By calling attention to this workshop, it is my hope that others gain more full and rich understanding of the value of art museum experiences and community partnerships.

RESEARCH METHODS

For this study, I chose to utilize narrative and case study techniques. Creswell (2009) defines a case study as a form of inquiry that can be used to study a specific, limited “program, event, activity, process, for one or more individuals” (p. 13). Similarly, Moore, Lapan, and Quartaroli (2012) define case study research as “an investigative approach used to thoroughly describe complex phenomena, such as recent events, important issues, or programs, in ways to unearth new and deeper understanding of these phenomena” (p. 244). Yin (2003) adds, “Such a phenomenon may be a project or program in an evaluation study” (p. 4).

Furthermore, I discovered my interest in constructivist theory, particularly social constructionism. Social constructivism is more concerned with how reality is shaped by social and interactive processes (Creswell, 2014; Young & Collin, 2004). Therefore, this interest in how individuals seek understanding of the world and develop personal

meanings of their experiences directed me toward narrative inquiry (Creswell, 2014). Narrative research examines “personal and social,” “past, present, and future,” and “the notion of place” (Clandinin & Connelly, 2000, p. 50). Narrative or storytelling is the social construction of meaning and as such it gives insight into how participants come to understand and value their experiences surrounding the workshop. Connelly and Clandinin (1990) define narrative inquiry as “the study of experience as story” where the researcher “adopts a particular view of experience as phenomenon under study” (as cited in Clandinin & Rosiek, 2007, p. 38). Because this study aims to understand and represent the stories lived and told by key administrators in their development of a program for medical students at the Blanton Museum of Art, a narrative case study suits my investigation (Moore, Lapan, & Quartaroli, 2012, p. 245).

DATA COLLECTION AND ANALYSIS

For this particular study, the case being analyzed is a three-part workshop held at the Blanton Museum of Art for first-year students of the Dell Medical School at The University of Texas at Austin in its second, post-pilot year of implementation in Fall 2017 and Spring 2018. In Fall 2017, Spring 2018, and Summer 2018, I collected data through direct observations, field notes, photographs and audio recordings of the workshops as well as semi-structured interviews with two key workshop administrators and four anonymous student participants who were systematically sampled. The phrase “key stakeholders” refers to the principal workshop administrators from both institutions involved in the workshop: (a) Dr. Ray Williams, Director of Education and Academic Affairs the Blanton Museum of Art and, (b) Dr. Alejandro Moreno, MBBS and MPH, Assistant Dean and Director of the Department of Medical Education and Associate

Professor in the Department of Internal Medicine; and (c) workshop participants, first-year students of the Dell Medical School between Fall 2016-Spring 2017.

Throughout my direct observations of the workshops, I gathered audio recordings, took photos, and maintained thorough field notes. During the semi-structured interviews, participants in the study recounted their personal experiences of the program. In Summer 2018, I transcribed and analyzed the content of these interviews. Primarily, I was looking for data that revealed how the student participants valued their experience of the workshop series at The University of Texas at Austin and the significance of the museum environment within their experiences. After triangulating my findings with the data from a variety of sources, I was able to narrow my findings to five themes that I identified from the data. The principal information sought throughout the content analysis of these interviews was how these stakeholders perceived the value of their experiences of the workshop. However, the data was also analyzed for indications of how these stakeholders perceive the value of the museum environment throughout their workshop experiences. The aforementioned sub-question allowed for this study to culminate into a conclusive narrative with implications for larger fields of study, adding to the readers' understanding of potential new directions for the fields of art and medical education.

DEFINITION OF TERMS

Arts Integration: “Arts integration refers to the incorporation of the arts into the non-arts curriculum by combining it with one or more other content area in the consideration of a selected topic or question” (Davis, 2006, p. 121).

Burnout: According to Maslach et al. (2001), burnout is defined as a response to chronic emotional and interpersonal stressors experienced while working. More specifically, Dyrbye et al. (2014) characterize physician burnout as a syndrome resulting

from work-related stress characterized by emotional exhaustion, feelings of cynicism, and detachment toward patients (depersonalization), and low sense of personal accomplishment (p. 443).

Constructivist Learning Theory (“Constructivism”): A theory about the way people learn and construct knowledge. Learning occurs when individuals create connections between new information and their own pre-existing knowledge and experiences (Jeffery-Clay, 1998; Kai-Kee, 2011; Taborsky, 1990).

Contextual Model of Learning (CML): A framework developed by Falk and Dierking (2013) regarding how individuals learn in museums. CML posits that “learning is a dialogue between the individual and his or her environment through time” (Falk & Dierking, 2013). See page 28 for further explanation and a visual representation of CML.

Empathy: While many definitions and interpretations of the term empathy exist, one commonly accepted definition amongst health care professionals is “a cognitive attribute that involves an ability to understand the patient’s inner experiences and perspective and a capability to communicate this understanding” (Hojat, Gonnella, Nasca, Mangione, Vergare, & Magee, 2002, p. 1563; see also Batt-Rawden, Chisolm, Anton, & Flickinger, 2013).

Humanism: In medical education, humanism is comprised of “altruism, empathy, professionalism, ethics, and laws governing health care in its curriculum” (Lombardi, 2016, p. 20).

Mindfulness: Langer (1993) defines mindfulness as a state of being that results from being subsumed wholly into an activity, exploring information from different perspectives and being open and sensitive to different contexts (see also Csikszentmihalyi & Hermanson, 1995; Speight, 2010). Chiesa (2013) elaborates upon the concept’s close association with memory in that mindfulness is thought to “enhance the ability not to

forget past experience, facilitating greater awareness and sense of purpose” (p. 256). Further definitions, such as that of Bishop et al. (2004), define mindfulness as “a process of regulating attention in order to bring a quality of non-elaborative awareness to current experience and a quality of relating to one’s experience within an orientation of curiosity, experiential openness, and acceptance” (p. 232). Note that this term is closely intertwined with the term *self-care* throughout this thesis.

Self-care: Orem defines self-care as involving the performance of activities that individuals personally initiate to maintain life and sense of well being (as cited in Easton, 1993). For the purpose of this study, self-care is very closely intertwined with mindfulness in that mindfulness “reduces human suffering... and ultimately leads to a calm and contented state characterized by emotional balance and psychological well being” (Chiesa, 2013, p. 256).

Visual Art(s): According to Johnson (2010), “The visual arts can be broadly defined as creative works that are predominantly visual in nature, including: painting, drawing, printmaking, sculpture, photography, and film... and may also be expanded to include architecture, performing arts, ceramics, and textiles” (p. 12).

Visual Literacy: Naghshineh et al. (2008) define this term as, “the ability to find meaning in imagery” (p. 991). In the context of health care, the term translates into the ability to observe and identify conditions of physiological health or disease (“physiology or pathophysiology”) from visual cues (Naghshineh et al., 2008, pp. 991).

Well-being: According to Munley and Rossiter (2015), well-being can be defined in terms of personal or societal/community well-being. For the sake of this thesis, I place emphasis on personal well-being, but both categories are acknowledged. Well-being, in the general sense, is defined as “feeling good and functioning well” and are typically embodied by people who are alert, aware, energetic, happy, a life-long learner in good

relationships with others, and contributes positively to the life of the community (Munley & Rossiter, 2015, p. 7).

Societal (or Community) Well-being: “The elements of community life that cannot be readily created by the individual alone, but must be co-created in consort with one’s neighbors, civic officials, public institutions and local government” and is characterized by community cohesion, civic engagement, local participation, safe spaces and environmental sustainability (as cited in Munley & Rossiter, 2015, p. 8).

LIMITATIONS OF STUDY

While case studies typically involve firsthand observation, interviews, and documentation at a particular site (Creswell, 2009, p. 181), I was not able to observe all three groups for each of the workshop’s visit. As a result, my firsthand observations are limited to my observations of two out of the three student groups who attended each of the three sessions. In order to improve the trustworthiness of my study, I triangulated the findings from my firsthand observations of the workshops with the findings from stakeholders’ questionnaire responses and semi-structured interviews. It is important to reiterate that the primary source of data for this study were the interviews conducted with research participants from which I generated a narrative addressing my central research questions.

Lastly, it is also important to note that while I maintained the anonymity of my student interviewees, it is possible that students felt pressure to provide responses they perceived to be favorable to the administrative stakeholders. In turn, program participants, due to their very nature as stakeholders, could be influenced by a natural desire for overall professional and/or academic success in and through the workshop.

This desire could influence their experience of the program and their perceptions of its value personally and professionally.

BENEFITS TO THE FIELD OF ART EDUCATION

It is my belief that art and, as a result, art museums are underutilized educational tools, exposure to and use of which can benefit and improve the personal and professional success of both individuals and communities (Ickovics, 2013). While the mere elucidation of existing (and successful) partnerships between arts and health institutions may not be sufficient inspiration for the establishment of similar partnerships and workshops, it is my hope that art educators—or educators in any field, for that matter—gain from this study an increased awareness of the value of arts-based teaching across disciplines and institutions. Additionally, I intend for this study to call attention to art museums as an interdisciplinary teaching resource that, when used effectively, can spark engaging, memorable, and transformative learning experiences for students in any field.

CONCLUSION

This chapter establishes this thesis as a narrative case study investigating the value key stakeholders from the Dell Medical School and Blanton Museum of Art ascribe to a collaborative, three-part art museum workshop for first-year medical students in its second year of implementation. Through content analysis of firsthand observations and semi-structured interviews with program administrators and participants, this study gauges their perceived value of the workshop within the museum environment. While the research focuses on one specific art museum workshop series and the personal experiences of its specific stakeholders, this study concludes with narrative implications regarding how the Blanton Museum of Art and its Director of Education, Ray Williams,

are embracing and fulfilling the role of public service through educational art museum programming.

In Chapter 2, I provide contextual research and information surrounding the role of the arts in interdisciplinary learning. I examine the concept of arts in education, its history, its definition and varied models, and its benefits. Secondly, this chapter delves into the role of art museums as integrated learning environments. In this section, I describe the social responsibility of art museums and their educators as well as the learning theories that currently influence their practice. The third section reviews other studies investigating arts intervention in medical education. This review is limited to studies evaluating the arts interventions' effectiveness in addressing visual literacy, self-care (or mindfulness), and empathy or empathetic communication as those were the most relevant to the study at hand. This section situates this study within the larger context of collaborative workshops between medical and arts institutions. This chapter concludes by addressing the gaps in existing research.

In Chapter 3, I define my research methodology as narrative case study, establishing the rules of practice that guided my data collection and content analysis of key stakeholders' perceptions of the workshop as I observed firsthand and/or as they expressed in semi-structured interviews. This chapter situates my investigation within the larger fields of narrative and case study while explaining the aspects of this study that are unique and add knowledge to the field of both medical and art education.

In Chapter 4, I first provide the reader with details about the two institutions involved in the workshop—the Blanton Museum of Art and the Dell Medical School at The University of Texas at Austin—and the key workshop administrators from each, Dr. Ray Williams and Dr. Alejandro Moreno. Then, I describe the structure of workshop as I personally observed and recorded through field notes, audio recordings, photographs, and

personal communication as recommended by experts in case study methodology (Creswell, 2009; Creswell, 2014; Moore, Lapan, & Quartaroli, 2012; Yin, 2003).

Chapter 5 is organized into subsections dedicated to each of the themes identified in my analysis of content gathered in firsthand observations and interviews with key stakeholders. Each subsection involves a summary of the theme and a discussion of how particular observations and interview responses, when taken together, pointed toward emergent patterns and themes. Furthermore, I identify and interpret data indicating how key stakeholders perceived the value of the museum environment—defined by its space, objects, and staff—as experienced by stakeholders throughout the workshops.

Finally, in Chapter 6, this study culminates into my own narrative interpretation of how the Blanton Museum of Art and its Director of Education, Ray Williams, are embracing their public service role in improving the well-being not only of medical students, but of their local community and society at large. In many ways, my thesis is concerned with both the smaller and bigger picture. By focusing on the stories of a key group of people doing important work within the fields of art and medical education, this study also reveals the ways this work impacts the future of these fields.

Chapter 2: Review of Literature

CHAPTER INTRODUCTION

In an effort to answer the central research question, this study draws on literature from a variety of fields including education, museum education, and medical theory and practice. In this chapter, I explore pertinent literature that guided and informed this study. First, I discuss the concept of arts in education, the museum and museum educators' role as an agent of public service through education, and current research surrounding arts interventions in the medical field. These literary bodies help to ground my research within the broader discourse surrounding contemporary museum education and educational theory. Additionally, this chapter develops the reader's understanding of the value of interdisciplinary programming in art museums, specifically those which serve the medical community.

INTERDISCIPLINARY LEARNING AND THE ROLE OF THE ARTS

In 2008, cognitive and developmental psychologist and founder of the Arts in Education Program at Harvard University Graduate School of Education Jessica Hoffmann Davis saw the withdrawal of the arts from public education and the return of mandatory testing and standardized performance. In response, Davis became an outspoken advocate for the arts in education in her book titled *Why the Schools Need the Arts* (2008). Davis (2008) writes, "We need to make sure our schools are welcoming places where children learn what it means to be human.... The time for change is now, and as I hope to convince you, the arts in education can show us the way. But we must travel with deliberate motion, learning from the past as we hold to the light" (p. 4). The past to which Davis refers includes many of the events, theorists, educators, politicians, legislation, and reports recounted later in this section plus others too innumerable for inclusion in this study. The range of perspectives surrounding arts education not only

diversifies our understanding of the topic (a good thing), it also contributes to misconceptions. In her book, Davis (2008) aimed to clarify these misperceptions in hope that doing so would make the need for arts in education all the more obvious.

First, this section begins by clarifying the history behind art in education and, more specifically, arts integration. It is important to be aware of how people and events throughout history have shaped the role of the arts in American education. Then, this section discusses the research and arguments of proponents and opponents of art education. It is my hope that this review of literature surrounding the topic of arts in education will clarify the readers' understanding of its associated history, meaning, benefits, and problems. At a time when the arts funding is increasingly at risk of being cut and/or removed from our educational institutions altogether, like Davis, I feel it is important to clarify the role and value of the arts in the lives of *all* students and people.

Historical Context

The widespread incorporation of the arts in American public education has undergone an interesting history beginning in 1870 with the passing of the Massachusetts Free Instruction in Drawing Act. The motivation for incorporating art within the public education curriculum at this time was mostly to meet industrial and professional needs. Soon thereafter, the role of arts education was seen as a means of refining an increasingly immigrant population with morals and beliefs that differed from the wealthier and predominately Puritanical "elite." In the years between the World Wars in America, the scientific rationalism that began in the 1890s manifested itself in the form of the scientific movement in general education, which was characterized by academic achievement testing and scientific curriculum development (Efland, 1990). However, a countervailing Progressive movement was forming in the work of Francis Wayland Parker and John

Dewey who “recognized that the arts had important consequences for stimulating the child’s powers of observation and interests” and would use those “natural interests as a basis for the curriculum” (Efland, 1990, p. 186).

The first quarter of the 20th century marks the emergence of progressive education theories that held the arts were a necessary part of education in America. Educator and theorist John Dewey believed traditional education isolated children from reality, placing the “blame for the ferment in education squarely at the feet of industrialism” (Cremin, 1964, p.17). Recognizing the urgent need for education reform, Dewey called for “a new body of subject matter, better ordered and better designed, that would begin with the experience of the learners and culminate with the organized subjects that represented the cumulative experience of the race” (Cremin, 1964, p. 220). According to Zimmerman and Kitsantas (1997), Dewey saw education as “a matter of individual growth and development of the social, common, and public aspects of experience. Stress was placed on the interrelatedness of individual, school, and society” (p. 3). Efland (1988) writes that Dewey espoused the belief that no subject “should be taught in isolation” and that the arts in particular are “not a segregated realm of endeavor but [are] a quality that makes certain experience worthwhile” (as cited in Burnaford, Aprill, & Weiss, 2001, p. xxxvii). The publication of Dewey’s *Schools of Tomorrow* (Dewey & Dewey, 1915) and *Democracy and Education* (1916) would soon inspire a new, more socially-minded stream of Progressive education.

During a speech at Harvard University in 1931, Dewey called for the reorganization of subjects so that “the interdependence of knowledge and the relationship between knowledge and human purpose would be made clear” (Kliebard, 2004, p. 149). During this speech, Dewey continued to introduce the concept of integrated subjects, arguing that we need a more full understanding of the how subjects are interrelated with

one another so that we can “increase both intellectual curiosity and understand while disclosing the world about us as a perennial source of esthetic delight” (Kliebard, 2004, p. 150). Dewey’s idea of subject integration reappears throughout the 1930s, including in the landmark report *A Correlated Curriculum* (Weeks, 1936) published by the National Council of Teachers of English. According to Burnaford, Brown, Doherty, and McLaughlin (2007), “This convincing treatise described a democratic education that combined subject-specific learning with interdisciplinary and integrated options for learning at the secondary level” (p. 3). The report laid the foundation for the contemporary idea that learning based on real-world problem solving is multidisciplinary and relevant to the real world.

In 1939, these ideas reemerged in Leon Winslow’s *The Integrated School Art Program*, a book in which he described a Reconstructionist model of education derivative of Deweyian ideas and characterized by emphasis on societal reform, integration of subject matter (including art), and community. Burnaford, Aprill and Weiss (2001) described Winslow’s new model as one “in which art—and all subject areas—are seamlessly stitched together to create a deeper, richer educational experience and are connected to the larger community outside the school walls” (p. xxxvii). Harold Benjamin introduced Winslow’s book with the following statement:

Activities that have become divorced from community life and purposes are perhaps suitable or even indispensable for a school purporting to give a timeless culture for its own sake, but they are unsuitable for a school as a living community.... Arts as a cult, as an esoteric experience for privileged devotees may be the art that is needed in a school of the first type. Art as a service to men living a common life, art as a means of attaining community goals, is certainly needed in the modern school. (Winslow, 1939, p. viii)

In the body of his book, Winslow (1939) went on to emphasize the integration of subject matter stating, “In such an educational program, art must be made to function broadly as

an integral part, the creative-appreciative part, of the elementary and secondary school curriculums” (p. 33). In short, Reconstructionist art education not only sought to emphasize art as a means to reform society, but also to unify the school experience away from the traditional subject-matter boundaries. And finally, Winslow called for Reconstructionist education centered on community. The community was the place in which students, children, individuals would be called to put their education and experiences to use to address and improve the problems of society.

However, these ideas received much backlash in the 1950s with the beginning of an Accountability Movement prompted by the Cold War. Anti-progressivists viewed the movement as anti-intellectual, frivolous and, according to Arthur Bestor in his book *Educational Wasteland* (1953), “undermining the intellectual quality of American education” (as cited in Efland, 1990, p. 227). However, the formation of the National Endowment for the Arts (NEA) in the 1960s continued to incentivize the integration of artists in schools and contributed to the growing interest in arts integration (Arts Integration Frameworks, Research and Practice, 2007, p. 1).

While the effects of the Accountability Movement lingered in public education throughout the end of the 20th century and into the 21st, some educational theorists advocated for less subject- or discipline-centered schools in favor of a fully integrated model. In his book *Curriculum Integration: Designing the Core of Democratic Education*, James Beane (1997) argues, “Imagine for a moment that we are confronted with some problem or puzzling situation in our lives. How do we approach the situation? Do we stop and ask ourselves which part of the situation is language arts, or music, or mathematics, or history, or art? I don’t think so. Instead, we take on the problem or situation using whatever knowledge is appropriate or pertinent without regard for subject area lines” (p. 7). Very much in line with Dewey’s ideas for a progressive education, Beane believes

that an integrated education more accurately represents real life experiences and instills more relevant problem-solving skills. Heidi Hayes Jacobs (1989, 1997, 1998) and Robin Fogarty (1992) draw upon Beane's theories to argue the benefits of using art as a means to approach problems in a way that transcends subject boundaries.

In 1992, the National Arts Association (NAA) published a statement in which it endorsed "well designed and well taught" integrated courses, using the arts as a means of enriching the teaching of other subject matter (as cited in Burnaford et al., 2007). However, this statement is the source of much controversy in the field of art education. Some view the NAA's statement as vague in terms of measuring "well designed and well taught" arts integration programs. Additionally, the NAA did not offer means nor suggestions for how teachers might develop arts integration strategies. However, the NAA's statement spurred more in-depth reports investigating the benefits of arts integrated learning in the 21st century.

In 2002, the Consortium of National Arts Education Associations' publication of *Authentic Connections: Interdisciplinary Work in the Arts* marked a turning point in the controversy surrounding arts integration. In addition to offering support to educators interested in interdisciplinary teaching, the document clarified the role of the arts in interdisciplinary education and how the subject can be taught with integrity by meeting content standards. "Interdisciplinary education," *Authentic Connections* (2002) claims, "enables students to identify and apply authentic connections between two or more disciplines and/or to understand essential concepts that transcend individual disciplines" (p. 3). This landmark document reaffirmed the importance of the arts in interdisciplinary education as well as planning, implementing, and adhering to national standards (Arts Integration Framework, 2007, p. 7).

In 2008, the President's Committee on Arts and Humanities (PCAH, 2008) released a report titled, "Reinvesting in Arts Education: Winning America's Future Through Creative Schools," which advocated for the arts in K-16 education. The report concluded by advocating for increased arts integration at the university level. Unfortunately, there have been few federal reports since the PCAH (2008) that have so comprehensively examined and advocated for the arts in American education (Barnes, 2008) and there is a need for further investigation into the challenges and opportunities for arts integration.

Defining the Arts in Education

It is important that this thesis clarify the nuances that distinguish terms or phrases associated with the arts in education that are often problematically used interchangeably. First, "art education" is a term that most commonly refers to visual art education. The plural term "arts education" is reserved for reference to all other arts disciplines such as dance, drama, and music education (Davis, 2008). The program under study for this thesis is primarily concerned with visual art (or "art education"). However, this section will not limit this review to the singular understanding of arts in education due to the fact that similar workshops utilize a variety of arts disciplines in order to achieve similar goals.

According to Davis (2008), the term "arts in education" encompasses "the different art disciplines in a variety of roles within the greater scene of education, including non-art classrooms and subjects" (p. 14). Davis (2008) identifies nine categories of arts in education: arts based, arts integrated, arts infused, arts included, arts expanded, arts professional, arts extras, aesthetic education and, finally, arts cultura. Here, I will briefly describe each of Davis' (2008) nine proposed categories in an effort to

clarify any general confusion surrounding the understanding of “arts in education.” It is important to note that these categories are not mutually exclusive and many educators may find that their own teaching styles implement some, if not many, of these scenarios simultaneously.

Arts Based Education

Davis (2008) defines arts based education as when “the arts supply the content for what is learned and serve as a model for teaching, learning, and assessment, and provide a window through which non-arts subjects are explored” (p. 14). In short, the arts are seen as the “gateway” to learning in and across all subjects. “Arts activities, the informed making and interpretation of works of art,” according to Davis (2008), “provide the impetus and tools for learning” (p. 16).

Arts Integrated Education (or Integrated Arts Education)

Arts integrated education (or “integrated arts education”) is when “the arts are intertwined with non-arts subjects, included as equal partners with the objective of improving teaching and learning within subjects and across the general curriculum” (Davis, 2008, p. 16).

Arts Infused Education

Arts infused education occurs when “artists or works of art are brought from outside in to enrich whatever is going on in arts and non-arts classes or activities... [infusing] artists’ contributions into the objectives of the curriculum rather than letting them stand as disconnected events or intrusions” (Davis, 2008, p. 17).

Arts Included Education

Davis (2008) defines arts included education as occurring when “the arts are situated among students’ required courses and are taught, respected, and allotted time with the same regard as non-arts courses” (p. 17).

Arts Expanded Education

In the arts expanded model, “education in the arts takes students outside of the school into the larger community.... [Students] are introduced through arts expansion to a range of locales for the arts beyond school walls, and they not incidentally learn how people are expected to act in such settings” (Davis, 2008, p. 18).

Arts Professional Education

Arts professional models of arts in education involve “holding high standards for admission... [and] rigorous artistic training that not only affords students advanced knowledge of different art forms, but also helps them prepare for careers in the arts” (Davis, 2008, p. 19).

Arts Extras Education

A seventh model for arts in education, arts extras, Davis (2008) defines as, “the most typical view of the arts in education today... as nonacademic extras reserved for in-school spaces and time outside of the daily curriculum” (p. 19).

Aesthetic Education

Aesthetic education, as defined by Davis (2008), contrasts arts extras as it “regards the arts as special curricular arenas for making and appreciating meaning that enriches all aspects of students’ thinking and living.... From this particularly philosophic perspective, students acquire from their consideration of works of arts unique skills of analytic thinking and familiarity with a wealth of aesthetic texts (books, poems, films,

musical compositions) that adroitly illuminate human experience.... The aesthetic education approach prioritizes the activities of perception (close attention to detail) and interpretation (making sense in one or many ways) that the arts invite and that may be useful to students in any class or activity” (p. 20).

Arts Cultura Education

Finally, Davis (2008) refers to the ninth method of implementing the arts in education as arts cultura, or when “arts educators recognize and frame curriculum around the role of making art in the expression of a continuum of views of culture.... In this last configuration of the arts in education, realized to different extents and in varying contexts by teachers around the country, educators use the arts to introduce students to various understandings of culture and invite them to discover and represent their connections with and distinction from others” (pp. 21-23).

Other Frameworks for Understanding Arts in Education

To reiterate, Davis (2008) asserts that the aforementioned categories and models of arts in education that she describes “do not preclude one another and, in an idealized setting all would hold sway” (p. 14). Many other researchers in the arts and education have proposed unique methods of categorizing and defining these forms of arts in education. In a review of literature, Burnaford et al. (2007) reduced their findings to only three types of arts integration: (a) “arts integration as learning ‘through’ and ‘with’ the arts,” (b) “arts integration as a curricular connections process,” and (c) “arts integration as collaborative engagement” (p. 13). Many of these models for arts in education proposed by Burnaford et al. (2007) share components with those of Davis (2008).

According to Burnaford et al. (2007), arts integration as “learning ‘through’ and ‘with’ the arts” supports the idea that arts-based learning leads to more neural

transformation of information. The literature review sites Catterall (2005) as a proponent of this argument. Catterall (2005) argues that the conversation and silence that occurs during art discussions (in classrooms, museums, etc.) helps students to solidify information both externally and internally. “The Rosetta stone for understanding transfer from learning in the arts to other domains,” Catterall (2005) argues, “may emerge as comprehension of the impact of arts-related neurological development on individual abilities to accomplish non-arts tasks” (p. 6).

The category of “arts integration as a curricular connections process” is focused on big ideas or shared concepts (Burnaford et al., 2007). In other words, authors of literature in this category view arts integration “as a means to connect certain elements of curriculum across content fields” with the use of a “shared concept” or “big idea” that spans multiple content domains (p. 13). Similarly, Yenawine (2005) proposed a “parallel process approach” as another method of utilizing art integration to form connections across disciplines. The parallel processes approach applies the processes involved in art as tools for learning and engaging students. For example, “learning to look is a process of stages, just as learning to read is a process of employing a series of gradually more complex steps” (Burnaford et al., 2007, p. 14). According to Yenawine (2005), “seeing those parallels across disciplines enables viewers and readers not only to become more skilled, but also more capable of making meaning” (p. 846). In yet another approach, Popovich (2006) argues that students’ interests and experiences should be the connecting factor that ties together the various disciplines.

Finally, the third category Burnaford et al. (2007) proposed in their review constitutes literature emphasizing the role of community partnerships in arts integration. Proponents of this “stream” of art integration argue that artists from the community should be central to the teaching process (Booth, 2003). Others claim that the

collaboration of arts integration should extend to parents, teachers, students, and community members both in and outside the school (Burnaford et al, 2007; Bresler, 1995; Grumet, 2004; Heath, 2001; Hefferen, 2005; Mason & Steedly, 2006; Myers & Scripp, 2007; Stokes, 2001; Strand, 2006).

To conclude, the authors identified one comprehensive definition of arts integration that encapsulates the qualities of each of the three categories of arts integration as well as those proposed by Davis (2008). The University of Tennessee Southeast Center for Education in the Arts (SCEA) defines arts integration as follows:

Arts Integration is instruction combining two or more content areas, wherein the arts constitute one or more of the integrated areas. The integration is based on shared or related concepts, and instruction in each content area has depth and integrity reflected by embedded assessments, standards, and objectives. Integrated instruction is often designed, implemented, and evaluated in collaboration with other teachers, arts specialists, community artists, and institutions; and delivered, experienced and assessed through a variety of modalities: artistic process, inquiry methods, and intelligences. Integrated (or interdisciplinary) learning uses the knowledge and methods of several disciplines in combination to explore a central concept, object or issue as a framework for building student competence. (as cited in Burnaford et al, 2007, p. 19)

This definition offers the most promising understanding of arts integration and, I believe, is most useful in describing the program on which this thesis is centered. This definition can be understood to include Davis' (2008) methods that are most relevant to this study: arts integrated, arts infused, arts expanded, aesthetic education, and arts cultura while allowing for a singular term: arts integration.

Objections to Arts Integration

Many scholars note the most critical issue involved with utilizing the arts with other subjects is finding the content balance between arts and non-arts subjects (Bates, 2000; Boswell & Heap, 2001; Kliebard, 2004; Winner & Hetland, 2000). Because arts integration is often argued as a means of supporting other subjects, opponents believe arts

integration diminishes the value of art in its own right. “After World War II,” Efland (1990), “criticisms of integrated arts programs began to mount. Generally, the feeling was that art had become the servant of other studies, that it was not important in its own right” (p. 210).

Another potential issue arts integration presents is the expectation placed on teachers. Some feel integrating the arts within all other subjects and vice-versa requires “extremely capable teachers” who are “well versed in all the subjects of the curriculum or in an environment in which teachers could pool their special knowledge via team teaching” (Efland, 1990, p. 210). While not outside of the realm of possibility, it is rare that public school administrators and teachers have the time and flexibility to permit such extensive planning, collaboration and coordination due to the demands of meeting assessment preparation deadlines.

Davis (2008) lists seven specific objections most commonly provided for objecting against including the arts in education in general: (a) the arts are not necessary; (b) the arts are only useful to students who can sell and profit off of their artwork; (c) there is not sufficient time in the school day to include art and it is less important than the other subjects; arts achievement cannot be measured; (e) teaching the arts require specialists; (f) the arts are too expensive; (g) “the arts will survive in the community even if schools eliminate them” (Davis, 2008, p. 24).

Benefits of Arts Integration

Early supporters of arts integration Newsome and Silver (1978) asserted that, “Non-artistic disciplines have discovered unexplored territories in the visual arts to be all things to all disciplines, in short, it can well be argued that the study of art is the most fruitful interdisciplinary study available to the academic world at all levels from

elementary through graduate school” (p. 23). Attenborough (2002) reiterates Deweyian ideas that, in order for the student to find the curriculum relevant, it must be concerned with a variety of real life experiences. As such, because “each life experience has a visual aspect to it, [it] can, therefore, be related to art in some way” (Attenborough, 2002, p. 90). While the concept of art integration was presented in arts education literature as early as the 1950s, the concept was not put into practice until later in the 20th century, therefore the concept lacked evidence of its benefits until the 1990s (Attenborough, 2002, p. 89).

Davis (2008) cites that there are at least five unique characteristics that exist together and inform one another in making the arts different from any other non-arts subjects in schools (Table 1). It is important to note here that, again, the schools to which Davis (2008) refers are specifically K-12 public schools. However, I find that the author’s points still mostly apply to University level subjects and, more relevant to this thesis, medical education. Davis (2008) list that, “...the arts are unique among school subjects because works of art feature the following: a tangible product, a focus on emotion, ambiguity, a process orientation, and a sense of connection” (p. 49). I found that these features and their resulting learning outcomes were observed in several research studies. I conclude this section with a description of *Champions of Change: The Impact of the Arts on Learning* (Fiske, 1999), a report analyzing the findings of seven longitudinal studies investigating the benefits of arts integration, many of which align with Davis’ (2008) five unique features of art in education as listed in Table 1.

Five Unique Features of Art in Education	Ten Invaluable Results of Arts Learning
I: Tangible Product	Imagination: The arts in education invite students to think beyond the given, to imagine, “What if?”
	Agency: The arts in education enable students to experience their significance as agents of effectiveness and change, to realize, “I matter.”
II: Focus on Emotion	Expression: The arts in education give students the opportunity to recognize and express their feelings, to acknowledge, “This is how I feel.”
	Empathy: The arts in education help students to be aware of and attentive to the emotions of others, to appreciate, “This is how you feel.”
III: Ambiguity	Interpretation: “The arts in education enable students to see that there are many equally viable ways in and out of the same subject, to know that even if their views differ from others’, “What I think matters.”
	Respect: The arts in education help students to be aware of, interested in and respectful of different ways of making sense of the world. They come to know that even if they disagree with peers, “What others think matters.”
IV: Process Orientation	Inquiry: The arts in education teach students about questions that make use of information but go beyond right and wrong answers to considerations of, “What do I want to know?”
	Reflection: The arts in education help students to develop skills of ongoing self-reflection and assessment, moving beyond judgments of good or bad to informed considerations of, “How am I doing and what will I do next?”

Table 1: The Five Unique Features of the Arts (Davis, 2008 pp. 49-76).

V: Connection	Engagement: The arts in education excite and engage students, awakening attitudes to learning that include passion and joy, and the discovery that “I care.”
	Responsibility: The arts in education connect children to others within and beyond school walls, helping to awaken a sense of social responsibility and action because “I care for others.”

Table 1 (continued): The Five Unique Features of the Arts (Davis, 2008 pp. 49-76).

Quantitative Support for Arts Integration

In 1999, the report *Champions of Change: The Impact of the Arts on Learning* described seven longitudinal studies of projects and partnerships pointing to arts integration as a means for improvement in schools, students, teachers, artists, faculty and even community. The report included the results of a study conducted by Catterall and Waldorf (1999) which shows trends that arts integration leads to “positive changes in school climate” (e.g., “principal leadership, focus on instruction, positive collegueship, and widespread participation in important decisions”); “support of school principals”; “more success in co-planning” and collaboration among teachers and artists; and the belief, among teachers, “that an arts integrated curriculum has learning, attitudinal, and social benefits” (p. 52).

A study by Wolf (1999) included in the *Champions of Change* report identified increased collaboration when the arts were involved in the curriculum. A study by Nelson (2001) of the A+ Schools Program, a program which uses arts as the foundation for teaching and learning in all subjects, found that “...arts integration provided opportunities for students to encounter the central ideas of the curriculum more frequently and more diversely, increasing the change for all students to master content at a deeper level (p. 5).

Data resulting from other studies of the A+ Schools Program “indicated increased parental communication, community involvement, teacher collaboration, and substantive assessments through the [A+ Schools Program] pilot” (as cited in Burnaford et al., 2007, p. 30; see also Corbett, McKenney, Noblit, & Wilson, 2001; Marron, 2003; Nelson, 2001).

In short, the report provided evidence of “enhanced learning and achievement when students are involved in a variety of arts experiences” (Burnaford et al., 2007, p. 30). Since *Champions of Change*, more data from recent studies indicate positive correlations between art integration and teamwork skills; improvements in community and school climate; perceived learning, attitude, and social skills among students; diversification of teaching and learning styles; and enhanced student engagement (Baker, Bevan, Admon, Clements, Erickson & Adams, 2004; Barry, Gunzenhauser, Montgomery, & Raiber, 2003; Brouillette & Burns, 2005; Catterall & Waldorf, 1999; Center for Arts Research in Education, 2002; Corbett, McKenney, Noblit & Wilson, 2001; Fiske, 1999; Hefferen, 2005; Hutchens & Pankratz, 2000; Ingram & Reidell, 2003; Ingram & Seashore, 2003; Marron, 2003; Nelson, 2001; Stevenson & Deasy, 2005; Werner, 2002; Wolf, 1999).

THE ART MUSEUM AS A LEARNING ENVIRONMENT

“Education in the art gallery/museum,” according to Attenborough (2002), “has developed in some ways, apart from the ways early museums were established and run” (p. 85). In the following subsection, I discuss how early museums have transformed over the centuries into institutions concerned with education and public service. However, as Attenborough (2002) points out, art museums were a bit slower to embrace these roles. Through a discussion of the transformation of museums’ roles overtime, I aim to give the

reader an understanding of historical, cultural, and social factors that have shaped the role of education in art museums today. Furthermore, this section describes educational theories about how learning occurs in informal (or non-school) learning environments.

The Museum as Social Instrument: A Brief History

While education seems to have been a central goal for museums throughout most of their centuries-long history in America, the purpose and accessibility of museum education initiatives have continually shifted over time in response to fluctuations in political, cultural, and social norms. These many changes in American museum identity has resulted in what Duncan F. Cameron (1972), former Director of The Brooklyn Museum, refers to as an “identity crisis” resembling “an advanced state of schizophrenia” (p. 189). Cameron (1972) asserts that the identity crisis museums were experiencing in the 1970s was the result of an obscured function. “The initial step,” he states, “will be to re-establish the museum’s role or, if you wish, its social function” (p. 195). Cameron’s article (1972) describes a museum in which the interpretation and experiences of museum audiences are taken into account, and where the collections are relevant to contemporary life and society. In short, he describes an idea that he admits is not new.

As early as 1917, John Cotton Dana diagnosed a similarly dismal psychological state afflicting our public museum institutions. In his book titled, *The Gloom of the Museum*, Dana (1917b) claimed the traditional museum model more closely resembled the temple to which Cameron (1972) refers, “[having] shown themselves to be collections, and little more; gratifying to a few, awesome to a few, tiresome to many, and helpful to almost none” (pp. 12-13). Dana went on to publish a series of books—referred to as *The New Museum Series*—in which he imagined a future museum that resembled the following:

...living organisms, with an abundance of teachers, with ample workshops, classrooms and spaces for handling the outgoing and incoming of objects which they lend... the experts will use their expertness partly on objects, as now; but they will sweeten much of it generously with the simple syrup of sympathy and use it for the pleasure and profit of the common man. (Dana, 1917a, p. 19)

Dana believed that few cultural institutions would survive a more discerning and democratic society if they did not function as “the public’s friend and guide” through the promotion of “refinements of human nature, those betterments of manner and feeling” and, ultimately, the “service of its people” (Dana, 1917a, pp. 29-30). However, despite the fact that many scholars for over a century have proposed such reforms, few museums would take action as “the museum world was not yet ready to become conscious of its public’s needs and wants” (Low, 1942, p. 12).

While Dana’s ideas were not fully embraced until half a century later, the 1960s and 1970s marked a turning point for museums as instruments of education and service to the public. With newfound awareness the crumbling of museums’ financial status, President Johnson called for an investigation into the conditions and needs of museums. The resulting report, titled *America’s Museums: The Belmont Report* (1969), established the American museum as “unique repositories of scientific, artistic, and historical wealth” deserving of public and federal support for continued fulfillment of their public educational role (letter from Roger L. Stevens as published in the Belmont Report, p. xii; Black, 2005). Munley and Roberts (2006) describe the period following the publication of President Johnson’s landmark *Belmont Report* as follows:

The once familiar ‘collect-preserve, and interpret’ mission that dominated twentieth century museums shifted toward a new audience-centered focus.... This shift, which finds its roots deep in the American museum movement with forward-thinking leaders like John Cotton Dana in the early 1900s and Theodore Low in the mid-1900s, began to take on new life in the 1970s with the emergence of a new generation of museum leadership... marked by an influx in museum educators committed to inclusion, respect, veiling relationships with a broad range of visitors, and giving voice to the disenfranchised. In many ways this new generation

brought the wave of change into the profession that was reflected across society at that time. (p. 31)

At a time of increased competition for scarcer public and private funding, the relevance and public value of museums came to be measured by “results-oriented accountability” or “an external appraisal of the benefits the museum provides to the individuals it serves” (Munley & Roberts, 2006, pp. 33-34). As a result, the reforms to American museums demanded by Dewey (1917), Dana (1917a; 1917b), Cameron (1972) and many other outspoken Progressives were finally in motion.

Over the following decades, several more influential reports investigating the role of American museums were published. In 1984, the “Museums for a New Century Commission Report” established museums as “a place of learning” declaring “education—the commitment to presenting objects and ideas in an informative and stimulating way” the central function of museums (American Association of Museums [AAM], 1984, p. 55). In 1992, the American Association of Museums (AAM) published a landmark report titled “Excellence and Equity: Education and the Public Dimension of Museums,” recommending three major reform for museums: “public service role based on education articulated in every museum’s mission and fundamental to every museum’s activities; increased inclusivity and diversity both in terms of audiences and internal structure; and vigorous leadership dedicated to pursuing the public service role of museums in society” (American Association of Museums [AAM] 1992, p. 25; see also Black, 2005; Munley & Roberts, 2006; Weil, 1990). Black (2005) observes that these three key reports established education as museums’ primary means of carrying out the museum’s chief purpose—public service.

While the many aforementioned theorists and reports are concerned with all public museums, the reforms for which they advocated were particularly influential for art museums. Historically, art has been seen as a consumable item of value only to those

who were educated and could afford the luxury of collecting art. Compared to subjects such as science or history, art has typically been viewed much less democratically and museums have followed suit. Cameron (1972) describes the principal problems facing the democratization of art museums:

The first of these [problems] was that collectors and those responsible for organizing and structuring the collections were now the members of an academic, curatorial elite whose members were most familiar and most comfortable with the models that were specific to their academic disciplines. Thus the public collections were structured as models which could only be meaningful to those with an education in which they had been introduced to... the academic approach to art and art history. The second and related problem was that the value systems which determined not only the selection of material, but the priorities for its presentation tended to be the value systems of the middle class if not an upper-middle class élite. This was, of course, particularly true for museums of art.... We created great art museums that reflect the heritage of bourgeois and aristocratic culture to the exclusion of popular or folk culture. (p. 195)

With the shift in museum focus from curating to service and education, museum educators have risen to leadership roles within museums. As Munley and Roberts (2006) summarize, “The institution-wide embrace of educational responsibility and public service, or the ‘new paradigm’ as Stephen Weil described it, has transformed the place of museum education and called on museum educators to re-imagine their roles both within their institutions and their communities” (p. 33). Positioned as the communicator between the museum and public, museum educators now play a crucial part in establishing the value of museums by “articulating, demonstrating, and documenting their ability to transform individuals and communities (Munley & Roberts, 2006). The museum educator of the 21st century must engage with their visitors in a new, dynamic way which respects the diversity of voices—from his or her own, to the visitors’, to “curators’ and art historians’, and the voices of tradition”—and applies her own resources as a trained and skilled educators to facilitate rather than dictate meaning-making, interpretation, and the construction of knowledge and learning (Kai Kee, 2011, pp. 48-49). Museums that

employ educators of this type embrace the role of “forum” for which Cameron (1972) advocates.

Informal Learning Environments

The museum environment is often characterized as an environment for informal learning as opposed to the formal learning students experience in school (Burchenal & Lasser, 2007). Informal learning environments (ILEs), according to Paris and Hapgood (2002), are “a variety of community settings such as museums, zoos, aquaria, parks, and botanical gardens...libraries, churches, and community centers... music and cultural festivals; and groups such as scouting and youth organizations... [involving] gatherings outside home and school to share new experiences” (p. 39). These ILEs most often utilize “objects and experiences rather than text” and “authentic artifacts [that] allow children to determine their own goals for exploration, discovery, and learning” (Paris & Hapgood, 2002, p. 41).

In Falk’s (1999) article, “Museums as Institutions for Personal Learning,” the author claims that the learning that occurs in museums is different from that which occurs in schools. Like Falk, authors Gutwell and Allen (2011) believe that “informal settings... constitute ideal environments for teaching and learning inquiry skills” (p. 711) and provide resources and a learning environment schools simply cannot replicate. While Gutwell and Allen’s (2011) research centered on science museums, the authors viewed museums as “a potentially powerful, yet underutilized resource for genuine, sustained inquiry” (p. 712). The benefits of learning in nontraditional or informal learning environments such as art museums include the following: free-choice learning, further exploration, appeals to multiple intelligences, and potentially, object-based learning or

aesthetic experience (Burchenal & Lasser, 2007; Falk & Dierking, 1995; Koller & Gibbons, 2005; Paris & Hapgood, 2002; Zeller, 1985).

One such benefit is that museum visits, particularly when self-guided, allow for “free-choice learning” which is more difficult, if not impossible, to achieve in the more structured classroom environment. For example, a museum visitor can see, be drawn toward, and inquire about any works of art in a gallery or exhibition. Paris and Hapgood (2002) argue that the visitor’s ability to “construct personal meaning, make choices, exercise control, engage in collaboration and conversation, adjust task challenges, and derive consequences of performance that promote self-efficacy” boosts the intrinsic motivation a visitor feels toward learning within the museum environment. Finally, informal learning environments, according to Reidinger (2012), “provide opportunities to learn together, interact, engage in conversations, and learn more about one another” (p. 125).

Finally, the opportunity for direct exposure to and interaction with authentic art objects makes meaningful learning about art more likely to occur (AAM, 1992; Henry, 1992; Hubard, 2007; Longhenry, 2007; Paris & Hapgood, 2002; Savedoff, 1999). Research has suggested that while students can learn about art or art history from unoriginal sources such as slides, models or reproductions in classrooms, the experience is different and, perhaps, weaker (Frost, 2002; Henry, 1992; Hubard, 2008; Longhenry, 2007; Savedoff, 1999). These studies suggest that students more highly value and, as a result, remember their experiences with original art objects (Henry, 1992; Hubard, 2007). Because this direct exposure to original most often occurs in art museums, it is also hard to separate the social context of the museum visit (Longhenry, 2007).

In its 1984 report, the American Association of Museum's Commission on Museums for a New Century discussed the unique and informal learning opportunities museums offer as follows:

To 'learn' in a museum means to develop the ability to synthesize ideas and form opinions, shape an esthetic and cultural sensibility. These intellectual qualities result from all kinds of learning, but they are in the special province of museums, where objects and ideas are interwoven in an open process of communication that blends study and exploration, seeing and thinking and, in many instances, touching. (pp. 58-59)

This "specialness" of museums to which the report refers is further explored in the framework offered by Falk and Dierking's (2013) aforementioned Contextual Model of Learning (CML).

Contextual Model of Learning (CML)

The Contextual Model of Learning emphasizes that learning is situated. In other words, this new framework considered the influence of place (or "physical context") shaped by sensory information and impressions in addition to personal and sociocultural contexts. These contexts intersect and overlap and are influenced by the fourth dimension of time. "Learning is a dialogue," Falk and Dierking (2013) simply state, "between the individual and his or her environment through time" (p. 140). See Figure 1 for a visual representation of the CML.

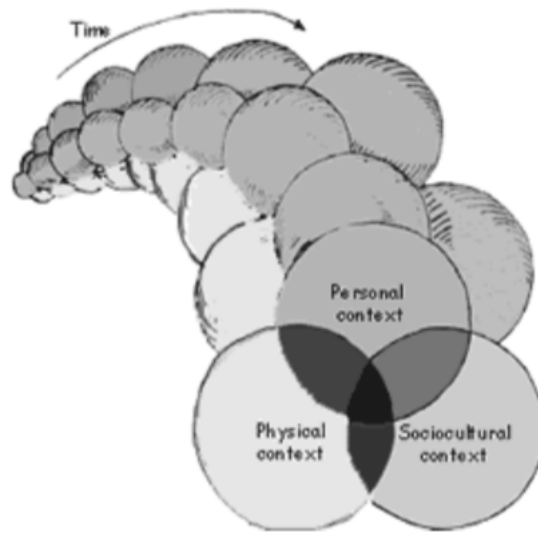


Figure 1: Falk and Dierking's Contextual Model of Learning (2013).

The authors generated a list of approximately eight direct and indirect factors that they consider to be particularly fundamental to the quality of the museum learning experience. Without all eight of the following factors listed in Table 2, meaning-making is more difficult to achieve.

<i>Personal Context</i>	
1.	Motivation and expectations
2.	Prior knowledge, interests, and beliefs
3.	Choice and control
<i>Sociocultural Context</i>	
4.	Within-group sociocultural mediation
5.	Facilitated mediation by others
<i>Physical Context</i>	
6.	Advance organizers and orientation
7.	Design
8.	Reinforcing events and experiences outside the museum

Table 2: Falk and Dierking (2013) Eight Key Factors of Museum Learning.

Personal context is shaped by the visitors' motivation and expectations; prior knowledge, interests and beliefs; and, finally, choice and control. As discussed earlier, informal learning environments such as art museums are better able to meet each of these factors. Falk and Dierking (2013) describe visitors' motivations and expectations as the predetermined reasons for their visit. These motivations and expectations "directly affect what people do and learn.... When expectations are fulfilled, learning is facilitated. When expectations are not met, learning suffers" (p. 141). Because museums attract and reinforce intrinsically motivated people, museums are more likely to succeed as opposed to schools, which often are influenced by extrinsic motivations (or feelings of obligation).

By virtue of prior knowledge, interests, and beliefs, learners make choices about what, where, when, how, and why they learn. "Because of the constructed nature of learning and the heterogeneous nature of museum-visiting populations, the prior knowledge, interests, and beliefs of museum visitors vary widely across, and even within, museums.... For all these reasons, learning in museums is always highly personal" (Falk & Dierking, 2013, p. 141). Furthermore, the authors assert that individuals learn best when they can choose what they learn and exercise control over their own learning. "Because museums are quintessential free-choice learning settings," Falk and Dierking (2013) argue, "they more often than not afford visitors abundant opportunity for both choice and control" (p. 141). In this way, museums distinguish themselves from the compulsory education and strict learning schedules.

As part of the sociocultural context, museums offer an environment for collaborative learning. Visitors often go as part of their own social groups—be it students and teachers, families, friends, etc.—which "utilize each other as vehicles for deciphering information, for reinforcing shared beliefs, for making meaning" (Falk & Dierking, 2013, p. 141). In addition to visitors' own social groups, museums are spaces in which visitors

encounter “others,” or a community of strangers. “Powerful socially mediated learning can occur with strangers perceived to be knowledgeable,” such as docents, guides, performers, etc. who can greatly affect visitor learning experiences (Falk & Dierking, 2013, p. 142).

Finally, the museum environment itself forms the physical context for learning. Based on prior research, if and when people feel secure and prepared, they are more likely to achieve greater learning. While museums can often be visually impressive and novel environments, orientation and advance organizers (or signage) in museums “significantly improves people’s ability to construct meaning from experiences” (Falk & Dierking, 2013, p. 142). Museums’ design of “compelling learning tools” such as exhibitions, websites, programs, and wall text are, according to Falk and Dierking (2013), “arguably one of the best educational mediums when designed appropriately” (p. 142). Finally, the reinforcement of museum experiences aids visitors’ learning. Falk and Dierking state that, “In a very real sense, the knowledge and experience gained from museums is incomplete; it requires enabling contexts to become whole” (p. 142).

Finally, Falk and Dierking’s (2013) emphasize time as the fourth dimension of their Contextual Model of Learning. By accumulating knowledge from multiple sources, from multiple exposures to sources at multiple times, visitors accumulate learning (Dierking, 2002). One visit to a museum does not strengthen a viewer’s ability to make meaning from an object. Rather, meaning is made in subsequent visits, exposures, and experiences that reinforce or relate to the repeated learning that has and will continue to occur. The ways in which each of these factors overlaps and interacts across time must be considered in order to fully understand how visitors learn from an art museum experience.

VISUAL ART & ART MUSEUM INTERVENTION IN MEDICAL EDUCATION

What is the relationship between art and science? In her book, *Why Our Schools Need the Arts* (2012), Jessica Hoffman Davis describes their relationship as that between “the known and the seen” or the “clearly is” and the “what may also be” (p. 11). Eisner and Powell (2008) believe both scientists and artists observe their surroundings, but the artist’s response to these observations is more “ethereal, global, impressionistic” than that of the scientist (p. 23). Foque (2010) states that Modernity was responsible for the sharp divide between what were two harmonious subjects, forming “two separate worldviews, alien to each other: that of the scientist, who searches for the objective truth, and that of the artist, who makes his own interpretations” (p. 19).

Artists such as Leonardo DaVinci represent the period before this divide, when you could be considered both artist and scientist, when each worldview acknowledged and embraced “the interconnectedness of nature, the unity of its patterns, and the analogy between the workings of the human body and those of the earth” (Isaacson, 2007). What function does their separation serve but to limit how we observe and respond to the world around us? The answers to this question have become increasingly apparent in medical education, where students and physicians are showing a need for the development of humanism to address problems in observation, communication, and resiliency all of which negatively affect the doctor-patient relationship.

In order to develop humanism in students and physicians, medical education has increasingly turned toward the arts in the last decade. Humanism, which is comprised of “altruism, empathy, professionalism, ethics, and laws governing health care” (Lombardi thesis, 2016, p. 20), has been seen as a skill very much in need of improvement amongst practicing doctors and doctors in training. As of recently, several governing bodies such as the Association of American Medical Colleges (AAMC) and the Accreditation

Council for Graduate Medical Education (ACGME) have begun to endorse curricular attention to the development of humanism in medical education, both in medical school and in subsequent medical training (Lombardi, 2016). Only recently, has it been agreed upon that humanism is “central to the development of effective, therapeutic doctor-patient relationships and that medicine has a responsibility to its students and to its practitioners to teach as such” (Lombardi, 2016, p. 20; see also Byyny, Papadakis, & Paauw, 2015; Papadakis et al., 2005). After all, as Hellín (2002) states, “To attend those who suffer, a physician must possess not only the scientific knowledge and technical abilities, but also an understanding of human nature” (p. 452)

The following sections describe the findings of recent studies investigating the intersections between the arts and medical or health science. Specifically, the following studies investigate the benefits of arts intervention in medical education. The following subsections center on studies that investigated the effectiveness of arts intervention in addressing problematic declines in observation, communication, and resiliency skills among doctors.

Visual Literacy to Improve Physical Diagnosis Skills

Visual literacy has been defined as “the ability to understand and evaluate visual messages” (Bristor & Drake, 1994, p. 75). Visual literacy is often thought of as a skill taught in the art classroom so that students may learn “how to look at a painting and how to read, analyze and deconstruct the techniques used by the artist” (Baker, 2012, p. 44). Kai Kee (2011) describes visual literacy as “reading the elements of art, more or less as a reader interprets the words of a sentence” (p. 43). However, today, the need for visual literacy has expanded beyond the arts classroom and into other disciplines. “Because so

much information is communicated visually,” Baker (2012) states, “it is more important than ever that our students learn what it means to be visually literate.” (p. 44).

In a study by Naghshineh et al. (2008), the authors apply the concept of visual literacy to medicine. They define the concept as “the ability to reason physiology and pathophysiology from careful and unbiased observation” (Naghshineh et al., 2008, p. 991). The study argues that while visual literacy “can provide information critical to the accuracy of a diagnostic evaluation,” there is evidence of declines in adequate use, confidence in use, and teaching of visual literacy and physical diagnostic skills (Naghshineh et al., 2008, p. 991). As a result, doctors are replacing fundamental bedside procedures, such as basic physical examinations and inspection with expensive laboratory tests and radiological studies. Naghshineh et al. (2008) propose that developing visual literacy among physicians and medical students could potentially improve the quality and lower cost of contemporary health care.

The objective of the study was to improve students’ “visual acumen through structured observation of artworks, understanding of fine arts concepts and applying these skills to patient care” (Naghshineh et al., 2008, p. 991). The study took place in a course titled *Training the Eye: Improving the Art of Physical Diagnosis* involving eight sessions. In the session, the students participated in observation exercises that integrated fine arts concepts with physical diagnosis topics as well as some art-making activities such as a life drawing session. The study found that when compared to the control group—medical students who had not taken the course—class participants averaged a higher frequency of accurate observations on a visual skills examination involving patient photographs and art imagery. Furthermore, the study found that students who had participated in the *Training the Eye* course “had increased sophistication in their descriptions of artistic and clinical imagery” (Naghshineh et al., 2008, p. 991). In short, the study found that the

course improved student participants' visual literacy as defined by their "capacity to make observations of art and physical findings" (p. 991).

A highly similar study was conducted by Jasani and Saks (2013) and found similar results. Their study concluded that, "using visual arts images with guided questions appears useful to train medical students in clinical observation skills" (p. 1330). However, the study went even further to suggest that these exercises and the results "can be replicated without specially trained personnel or art museum partnerships" (Jasani & Saks, 2013, p. 1330). While I believe this addition to the finding is beneficial to many medical schools that do not have the resources to utilize specially trained personnel or museum partnerships, I believe the investigation minimizes the benefits of developing visual literacy skills within a museum environment specialized for such visual and object-based learning. A study by Lyon, Letschka, Ainsworth and Haq (2013) supported the idea that art, specifically, an interdisciplinary collaborative drawing activity can improve students' "critical looking" skills as well as their ability to reflect on bodily knowledge and understanding (p. 1).

In contrast to Jasani and Saks' (2013) study, a report by Russell (2017) highlights the significance of working with specially trained personnel and museum-based curriculum for the development of visual skills support the effectiveness of a museum-based curriculum that teaches observational skills to medical students. Russell (2017) recounts the story of how in 2001, Professor Braverman, a specialist in Dermatology at Yale School of Medicine, developed one of the first courses to experiment with developing students' medical observational skills. As part of his course, Dr. Braverman took his students to the Yale Center for British Art (YCBA) where he was joined by Linda Friedlaender, the Curator of Education at the YCBA. Friedlaender's role for the course was to select the paintings with a narrative focus for the residents to observe,

“paintings that were full of details to ‘read’ and describe and could be used to offer an interactive learning experience” (Russell, 2017, p. 498). As in Jasani and Saks’ (2013) study, the test scores of students who participated in the museum course developed by Dr. Braverman and Friedlaender improved, particularly in examining photographs used in the examination (Dolev, Friedlaender & Braverman, 2001). In response to why the course benefitted by having the expertise of Firdlaender as well as the use of the Yale Center for British Arts, Dr. Braverman claimed that, “What she added was the description of paintings. She was able to add a few more details that were quickly overlooked.... Based on the nature of dermatology, we could not overlook the minor details” (as cited in Russell, 2017, p. 498).

Since Dolev, Friedlaender and Braverman (2001) published their results, many institutions of medical education have formed similar partnerships with local museums and galleries. A similar course, which actually had begun right around the same time as Braverman’s (2001), took place between the Weil Medical College of Cornell and the Frick Collection. Led by Dr. Charles Bardes, eight students attended three sessions in which they engaged in visual observation and description exercises in the gallery. Bardes, Gillers and Herman (2002) state, “In clinical diagnosis, the physician observes, describes, and interprets visual information,” but rarely does medical education “emphasize the actual skill of careful looking; looking is often assumed” (p. 1157). The course proved statistical and longitudinal significance in influencing the students’ clinical skills as well as improved “awareness of emotional and character expression in the human face” (Bardes, Gillers, Herman, 2002, p. 1159).

Similar courses such as one taught by Dr. Joel Katz at Harvard Medical School entitled “Training the Eye: Improving the Art of Physical Diagnosis”; a course at the Museum of Fine Arts Boston entitled “Refining the Eye: Art and Dermatology” for

students of Harvard Medical School (Zimmermann, Huang, Buzney, 2016); a partnership course between the University of Cincinnati College of Medicine and Cincinnati Art Museum; and also a course for medical students of University of Alabama at Birmingham at the Birmingham Museum of Art have all shown that medical students exposed to the museum-based courses not only improved students' observational abilities, but had more lasting impact than isolated exposures, particularly when students were asked to reflect on their museum experiences (as cited in Russell, 2017, p. 501; see also Zimmerman, Huang & Buzney, 2016). When efforts have been made to incorporate visual literacy development into clinical training, the results from such courses have been promising even when teaching methods are limited (Bardes, Gillers & Herman, 2002; Dolev, Friedlaender & Braverman, 2001; Jasani & Saks, 2013; Lyon, Letschka, Ainsworth, Haq, 2013; Naghshineh et al., 2008; Rentmeester & Severson, 2014; Russell, 2017).

Empathy to Reduce Bias and Improve Patient Communication

Today, there is a growing body of research delving into the importance of empathy in many aspects of medicine. Studies have shown that physician empathy can lead to improved patient satisfaction, greater adherence to therapy, better clinical outcomes, and lower malpractice liability (as cited in Batt-Rawden et al., 2013; see also Di Blasi, Harkness, Ernst, Georgiou & Kleijnen, 2001; Hojat, Louis, Markham, Wender, Rabinowitz & Gonnella, 2011; Kim, Kaplowitz & Johnson, 2001; Kim, Kaplowitz & Johnson, 2004; Levinson, Roter, Mullooly, Dull & Frankel, 1997; Rakel, Barrett, Zhang, et al., 2011; Rakel, Hoeft, Barrett, Chewning, Craig & Niu, 2009; Vermeire, Hearnshaw, Van Royen & Denekens, 2001; Zachariae, Pedersen, Jensen, Ehrnrooth, Rossen, von der Maase, 2003;). Despite this understanding of the power of empathy as demonstrated in

multiple studies, there is much evidence to suggest that medical training leads to decreases in student empathy (Reiss, Kelley, Bailey, Dunn & Phillips, 2012).

While empathy is a difficult concept to define, Hojat et al. (2002) offer a commonly accepted, clinically-oriented definition: “a cognitive attribute that involves an ability to understand the patient’s inner experiences and perspective and a capability to communicate this understanding” (p. 1563). Batt-Rawden et al. (2013) describe two dimensions of clinical empathy: the affective and the cognitive. The affective dimension of empathy “describes the passive emotional response of one individual to the emotions of another,” while cognitive dimension “is an active skill that may be acquired and is amenable to nurturing” (Batt-Rawden et al., 2013, p. 1171; see also Hojat et al., 2002). The cognitive dimension is what the researchers refer to as “detached concern, or the ability of one individual to understand the experiences of another without invoking a personal emotional response” (Batt-Rawden et al., 2013, p. 1171; Hojat et al., 2002; Neumann, Bensing, Mercer, Ernstmann, Ommen, & Pfaff, 2009).

Empathy has been a required learning objective for medical education by the Association of American Medical Colleges. Additionally, the Federation of State Medical Boards has recently enforced testing for competency in physician-patient communication for license renewal (Reiss et al., 2012). However, it is important to acknowledge that despite the importance placed on learning empathy skills, “empathy training is not specifically taught in most undergraduate or graduate medical education programs” (Reiss et al., 2012, p. 1280; see also Alder, Christen, Zemp & Bitzer, 2007; Kelm, Womer, Walter & Feudtner, 2014; Smith et al., 1995). In fact, at times, declines in empathy might benefit medical students by acting as a buffer for psychological distress. A study by Hojat et al. (2009) found that the third year of medical school—a year in which the curriculum is focused on patient-care activities—is when students’ empathy scores tended to drop

most often. This drop can be attributed to desensitization and self-protection against medical students' own emotional distress and the idea that students must maintain emotional distance between themselves and their patients (Reiss et al., 2012). Over time, however, such distancing and lack of empathy can lead to increased cynicism and decreased professionalism. Furthermore, studies have shown that the students may not be able to rebound from such declines (Reiss et al., 2012).

Once again, many studies have investigated the potential contributions of visual art interventions on students' "ability for self-reflection, communication skills with patients (and colleagues) and an increased sense of empathy" (Bentwich & Gilbey, 2017, p. 2; see also Bardes, Gillers, & Herman, 2002; Elder, Tobias, Lucero-Criswell, & Goldenhar, 2006; Katz & Khoshbin, 2014; Reilly, Ring, & Duke, 2005). In a study by Bentwich and Gilbey (2017), the researchers sought information surrounding the effects of visual arts teaching on medical students' "tolerance of ambiguity," defined as "accepting multiple interpretations" and "its possible correlation to empathy" (pp. 1-3). After testing Visual Thinking Strategies (VTS) on medical students over the course of a medical ethics course for first-year medical students, the study found that the majority of the student participant's felt that visual arts learning positively contributed to their acceptance of multiple possible meanings.

Furthermore, the researchers concluded that the discussion of artworks utilizing techniques "as employed in VTS may have a potential contribution to empathy" (Bentwich & Gilbey, 2017, p. 5). Their investigation points Dewey's concept of "Imagination" as the connection between art and empathy. Bentwich and Gilbey (2017) explain the connection as the following:

Cultivating the imagination, in turn, necessitates rich experiences embedded in learning environments, which will broaden our horizons and extend our thinking.... It follows that since the arts are a potential

significant cultivator of imagination, they may be understood as vital for the enhancement of the tolerance for ambiguity. Moreover, it is precisely through our understanding that the arts (and imagination) are means to enhance the tolerance of ambiguity, that we may also learn to appreciate their importance for the enhancement of empathy. According to this interpretation, empathy necessitates the ability to see ‘the world’ from the other person’s viewpoint, while keeping well-drawn boundaries between self and other. Yet such ability is contingent upon acknowledging that there can be other view of the world or multiple interpretations of it, namely that we are able to tolerate ambiguities. Therefore, from this perspective, empathy and tolerance of ambiguity are closely related (p. 7)

However, the study by Bentwich and Gilbey (2017) is criticized for being based on students’ self-reports and for lacking a control group against which to compare their findings of the VTS strategies. Therefore, despite finding similar results a second year, their findings should be treated with caution. In fact, a literature review by Kelm, Womer, Walter and Feudtner (2014) investigating the current studies on empathy intervention amongst medical students found that many of the qualitative studies mentioned above are limited by methodological weaknesses. However, the few high-quality designs utilizing “more randomized, controlled studies with valid measures, explicit reporting of intervention strategies and procedures, and long-term efficacy assessments” do provide initial support for the idea that the arts intervention can improve physician empathy, but more studies of this nature are necessary (Kelm, Womer, Walter & Feudtner 2014, pp. 7-8).

Self-Care to Reduce Physician Burnout

A study by Dyrbye et al. (2014) claims that numerous studies are finding that medical trainees are experiencing burnout at a rapid rate (Dyrbye et al., 2009; Dyrbye et al., 2010; West, Shanafelt & Kolars, 2011). The study describes burnout as “a syndrome resulting from work-related stress characterized by emotional exhaustion, feelings of cynicism and detachment toward patients (depersonalization), and a low sense of personal accomplishment (Dyrbye et al., 2014; Maslach, Jackson, & Leiter, 1996).

Because burnout is associated with the erosion of professionalism and increased likelihood of “medical error, suicidal ideation and attrition, as well as substance abuse and relationship difficulties” (Dyrbye et al, 2014, p. 443; see also Dyrbye et al., 2010; Dyrbye, et al., 2009; Dyrbye, Thomas, Power, et al., 2010; Oreskovich, Kaups, Balch et al., 2012; West, Huschka, Novotny et al., 2006; Shanafelt, Sloan & Haberman, 2003), this finding is problematic. A recent national study found that, “physician burnout affects over 50% of physicians in training and early clinical practice” (Gooding et al., 2016, p. 123). While burnout has been detected at higher rates among physicians in training, studies have shown that “physicians may experience little relief from the high levels of work-related stress documented during training” (Dyrbye et al., 2014, p. 443).

In response, many medical schools and hospitals have begun to address concerns of physician burnout by including reflective practices and physician wellness programs within the curriculum. Specifically, exercises that encourage the exploration of “personal meaning found in the experience of caring for others,” “mindfulness and social excursions that promote connection with colleagues outside of the work environment,” as well as the cultivation of skills such as “compassion, acceptance, and gratitude” all seem to show promise in preventing burnout and the erosion of empathy (Gooding et al., 2016, p. 123; see also Lefebvre, 2012; Remen & Rabow, 2005; Sood et al., 2011).

In 2010, the Department of Medicine residency partnered with the Boston Museum of Fine Arts (MFA) with the goals of “using art to enable residents to connect deeply to their work in a way that might otherwise prove difficult as well as to reconnect with themselves and their colleges in a very human way” (Gooding et al, 2016, p. 124). The program was developed around the idea that “the museum represents a special learning environment for our trainees” and that, because it is “designed for peaceful contemplation and close looking,” the museum offers a unique learning experience for

the students (Gooding et al, 2016, p. 124). After conducting interviews and evaluations to assess key stakeholders' responses to the program, Gooding et al. (2016) found that students and the museum benefit from the collaborative medical training program: "the museum experience is so effective at fostering connection between our learnings and enhancing their reflective capabilities.... and provides residents with an important touchstone for challenging days at work with emotional encounters with patients and colleagues" (p. 127).

While the study was not able to provide quantitative data surrounding the evaluations nor did it investigate the longitudinal effects of the program, the study offered rich detail from multiple, critical perspectives involved in the program—the Residency program director, the curriculum director, the museum educators, as well as a resident participant. Additionally, through critical analysis of the resident evaluations collected at the program's end triangulated the researchers' interview findings and supported the finding that the program supported residents' "commitment to self-care," "[connection] with patients" and "practice of mindfulness" (Gooding et al, 2016, p. 127).

CONCLUSION

This chapter has examined literature pertinent to the value of art museum education experiences for children and students, society and, more specifically, medical and health practitioners. I have discussed the concept of arts in education, the museum and museum educators' postmodern role as an agent of public service through education, and current research surrounding arts interventions in the medical field. Embedded in these literary bodies are elements of Progressive museum and educational theory. While there is an abundance of scholarship concerning the value of art museum experiences,

research on the value of these experiences for medical students specifically is only emerging.

Additionally, there is much attention in the art museum field dedicated to access programming for audiences outside of those traditionally served by museums—specifically, those diagnosed with mental and/or physical disabilities. While this practice and body of research within museums should continue to grow, there is a need for further research into humanistic disabilities that can also be addressed and potentially alleviated through art museum programming or else negatively affect communities on a micro- and macro-scale if ignored.

In the chapter that follows, I explore the contextual information relevant to my investigation of the workshop series at the Blanton Museum of Art for students of the Dell Medical School. This information will situate my case study within its broader historical, political, social, and cultural frameworks.

Chapter 3: Methodology

CHAPTER INTRODUCTION

Investigating Dell Medical School students' perceptions of the value of a three-part workshop series at the Blanton Museum of Art required the development of a comprehensive research plan. Guided by the central research question, I crafted a unique research approach in order to achieve the objectives of this study. A research approach is a broad framework in which three key components intersect: the philosophy, design, and methods of investigation utilized in this study. In planning a study, the researcher must consider the specific worldview and assumptions she brings to the investigation, the research design that reflects this philosophy, and the tools and methods that enable her to translate these ideas into practice (Creswell, 2014). In this chapter, I describe the theoretical footings of each of these three aspects of my research approach in addition to describing their practical application during the investigation.

RESEARCH PHILOSOPHY

According to Guba (1990), research philosophy is the “basic set of beliefs that guide [the] action” of the researcher (p. 17). Creswell (2014) describes the philosophy as the researcher's worldview, which encapsulates the beliefs, assumptions, and inherent biases that a researcher may carry into her study. While many researchers claim objectivity as “one of the most cherished ideals” of research, many also concede that it is a simply “unrealizable ideal” (Eisner, 1992, pp. 9-14) due to the personal experiences, perspectives and biases that a researcher inevitably brings with her. According to Mertens (2010) the philosophy acts as “a metaphysical framework to enable researchers to examine the underlying belief systems that guide their work” (p. 470). By acknowledging the researcher's unavoidable subjectivity and her influence on the study, the research philosophy adds a level of transparency and strengthens the trustworthiness of a study.

This investigation, like many qualitative studies, is situated within a social constructivist research philosophy. According to Creswell (2013), social constructivism is an interpretive framework whereby individuals develop their own meanings of the world that correspond to their personal experience. Therefore, reality is not innately understood by individuals, but rather formed through interaction with others (Creswell, 2014). In short, social constructivists believe knowledge and truth are created by the interactions of individuals within a society (Andrews, 2012). I applied this interpretive framework of social constructivism to this study by asking research participants open-ended questions as recommended by Creswell (2013). My role, as researcher, was to read and listen carefully to their unique responses so that I could interpret the findings based on the participants' unique backgrounds and experiences (Creswell, 2013).

Interpretivism is a paradigm in which researchers “attempt to understand phenomena by accessing the meaning and value that study participants assign to them” (Reimer, Quartaroli, & Lapan, 2012, p. 8). Interpretivism often goes hand-in-hand with social constructivism as each assumes that, “the inquirer must elucidate the process of meaning construction and clarify what and how meanings are embodied in the language and actions of social actors” (Schwandt, 1998, p. 222). Applying the social constructionism and interpretivist frameworks was the best approach in capturing the experiences, perceptions and nuances that influenced the individual realities of my participants while also adding my own “construction of the constructions” of the study participants (Schwandt, 1998, p. 222).

Positionality of the Researcher

The social constructivist and interpretivist paradigms have informed this research in meaningful ways. As an individual personally interested in the arts, I am aware that my

own experiences with art, museums, as well as doctors and medicine may influence my interpretation of my firsthand observations of the workshop as well as how I interpret the data relayed during interviews with key stakeholders. I hope that this transparency regarding my own positionality as a researcher strengthens the transparency and, therefore, the validity of this research rather than weaken it. Having presented the theoretical and philosophical foundations upon which this research is based, I now introduce the second portion of my research approach: the research design.

RESEARCH DESIGN

Creswell (2014) writes that the research design, or methodology, of a study provides the investigator with specific procedural direction in which to conduct the study (pp. 11-12). In short, the research design acts as a broad plan for the investigation that aligns with the investigator's philosophy, or worldview, as described above. To put it in other terms, research design addresses what questions to study, what data is relevant, what data to collect, and how to analyze the results (Pilliber, Schwab & Samsloss, 1980).

For this study I utilized a qualitative, mixed methods case study research design. In this section, I describe each aspect of this specific design and explain my reasoning in employing each of the following components in my research. The following research design guided me in the process of collecting, analyzing, and interpreting my data.

Qualitative Research

Creswell (2009) describes qualitative research as “a means for exploring and understanding the meaning individuals or groups ascribe to a social or human problem” (p. 4). “The focus of qualitative research,” according to Creswell (2014), “is on participants’ perceptions and experiences, and the way they make sense of their lives” (p. 206; see also Fraenkel & Wallen, 1990; Merriam, 1988). Unlike quantitative studies,

qualitative research relies on the socially constructed nature of reality and seeks to answer questions that ask how a social experience is created and given meaning. Therefore, qualitative researchers are primarily interested in data that emerges from words or pictures as opposed to numbers, employ unique processes of data analysis, and draw on a wide range of designs. The core characteristics that define qualitative research are natural setting, researcher as key instrument, and multiple sources of data (Creswell, 2014; Denzin & Lincoln, 2008).

Qualitative inquiry enables the researcher to gather rich, meaningful information regarding the ways in which individuals make meaning of their lived experiences and to draw themes from this data. This study focused on understanding how first-year medical student participants value a workshop that took place in the unique setting of the Blanton Museum of Art, and how this perception of value might change over time. Therefore, qualitative inquiry was the most appropriate research method for this study as it is interested in the subjective experiences of those researched and the meaning or value that they assign to these experiences.

Narrative Case Study Research

Much like qualitative research, Stake (1995) and Yin (2003) base their approach to case study on a constructivist paradigm. As previously mentioned, constructivism is based on the claim that the truth is relative and dependent on one's perspective. Baxter and Jack (2008) claim the following:

Constructivism is built upon the premise of a social construction of reality (Searle, 1995). One of the advantages of this approach is the close collaboration between the researcher and the participant, while enabling participants to tell their stories (Crabtree & Miller, 1999). Through these stories the participants are able to describe their views of reality and this enables the researcher to better understand the participants' actions (Lather, 1992; Robottom & Hart, 1993). (p. 545)

My interest in the constructivist paradigm also guided me toward narrative inquiry as a means of understanding how individuals seek understanding of the world and develop personal meanings of their experiences (Creswell, 2014). Narrative research examines “personal and social,” “past, present, and future,” and “the notion of place” (Clandinin & Connelly, 2000, p. 50). Narrative or storytelling is the social construction of meaning and as such it gives insight into how participants come to understand and value their experiences surrounding the workshop. Connelly and Clandinin (1990) define narrative inquiry as “the study of experience as story” where the researcher “adopts a particular view of experience as phenomenon under study” (as cited in Clandinin & Rosiek, 2007, p. 38). Because this study aims to understand and represent the stories lived and told by key stakeholders in their experience of workshop for medical students at the Blanton Museum of Art, a narrative case study suits my investigation (Moore, Lapan, & Quartaroli, 2012, p. 245).

Hancock and Algozzine (2006) claim, “Case study research is generally more exploratory than confirmatory” (p. 16). The case study researcher seeks to identify themes or patterns of behavior and events as opposed to proving relationships or testing a hypothesis, as in experimental research (Hancock & Algozzine, 2006). Due to exploring a phenomenon in detail, it is common for case study researchers to identify and explore other questions throughout the research process. In this investigation, the principle research question was, “How do keys stakeholders perceive the value of a collaborative art museum workshop for students of the Dell Medical School?” However, from this investigation, the following sub-questions arose: How do these findings support the educational value of art museum experiences for students and professionals within the medical field? How do these findings support the relevance of art museums within their respective communities?

Several characteristics define case study research. According to Yin (2003), case study involves an investigation of a contemporary phenomenon within its natural context using multiple sources of evidence. Case studies usually focus on a phenomenon, such as a particular program, event, situation, or activity that is bounded by space and time (Hancock & Algozzine, 2006). In the following subsections, I describe the participants in this investigation and how this research was bounded by space and time. The particular program under investigation is thoroughly described in Chapter 4.

Site for the Study: The Blanton Museum of Art

The one site involved in my case study research was The Blanton Museum of Art at The University of Texas at Austin. After discussing my research ideas with administrators at both the Blanton Museum of Art and the Dell Medical School who are involved with the museum workshop, I received approval to conduct my investigation at the Blanton.

I wanted to ensure that the participants in the study felt comfortable when I was observing them during the workshops at the Museum. Because I am familiar with the Blanton and had met Dr. Ray Williams, the lead Museum Educator for the workshop, and Dr. Alejandro Moreno of the Dell Medical School before the observations took place, I felt comfortable being in a space and among people with whom I was familiar. I made a concerted effort to minimize my interaction with the key stakeholders during the workshops as my goal was to observe the workshops as they would normally be implemented.

Participants in the Study: Key Stakeholders

There were a total of 15 student participants, 3 members of Dell Medical School faculty and DOCS Mentors, and 2 educators from the Blanton Museum of Art present in

each of the three workshops that I observed. It is important to note that while there are 50 students in each class at Dell Medical School, the cohort is divided into three groups of roughly 15, 15, and 20 students who participate in the workshops on different dates in order to make the workshops more manageable for the museum educators. Due to the limitations in time for this investigation, I only observed one of these groups of students during each of their three visits. In the following chapter, I describe the structure of the workshops in further detail as well as my own firsthand observations of the workshop for the first group of 15 students, 3 mentors, and 2 educators.

In order to get in-depth understanding of key stakeholders' experiences, I selected two workshop administrators from each institution—Dr. Ray Williams from the Blanton Museum of Art and Dr. Alejandro Moreno from the Dell Medical School. I then strategically sampled four students from the one group of Dell Medical School students who participated in the workshops that I observed in Fall 2016-Spring 2017. I strategically selected these students by determining in advance that I would approach every third student to enter the Blanton on the first day of the workshop to inquire about voluntary participation in an interview about their experience of the workshops. While I selected the students on the first day of the workshops, I did not approach them until the end of the third and final workshop in order to avoid influencing their perception of the program's value throughout their experience. Of the five students who I approached, four agreed to be interviewed. Half the students were female and half were male. At the time of the interviews, there was a sixteen-year range in the age of the students who participated in interviews.

Because I was concerned that the student stakeholders I selected for interviews might feel pressured to value the program positively out of a concern for their academic standing in the class, I decided to maintain their anonymity outside of my own

interactions with them. While some stakeholder bias is inevitable I believed that maintaining the students' complete anonymity might alleviate any pressure they felt to perceive the program a certain way, thereby minimizing potential bias in their interview responses. However, because the administrators have already publicly voiced their own opinions and perceptions of the workshops in recent news coverage and in their own institutional publications, I felt maintaining their anonymity was not necessary. Therefore, I describe the two selected workshop administrators—Dr. Ray Williams from the Blanton Museum of Art and Dr. Alejandro Moreno of the Dell Medical School—in greater detail in the following chapter.

Timeline for the Study: Fall 2017, Fall 2018, Summer 2018

This investigation took place throughout the fall of 2017, Spring of 2018, and Summer of 2018. Beginning in early Fall 2017, I conducted semi-structured interviews with Dr. Ray Williams of the Blanton Museum of Art and Dr. Alejandro Moreno of the Dell Medical School. Soon thereafter, I observed the first session of the workshops at the Blanton in August of 2017 that focused on developing the students' visual literacy. In April 2018, I observed the other two sessions focused on developing students' skills in self-care and empathetic communication. Throughout these observations, I maintained thorough field notes and, with permission from the workshop administrators, I took photos of the participants in action. I spent the remainder of the Spring 2018 semester organizing and analyzing this data for recurrent patterns and themes.

I began the next stage of my data collection in Summer 2018 by conducting oral and written interviews with the three selected key stakeholders: Dr. Ray Williams of the Blanton Museum of Art; Dr. Alejandro Moreno of the Dell Medical School; and four anonymous student participants in the workshops. Once all interviews had been

conducted, I spent the remainder of the Summer 2018 and early Fall 2018 analyzing the content of the interviews responses. As I gathered new data and discovered new findings, I also returned to the data collected during the observation stage (field notes, voice recordings and photos), reorganizing, reanalyzing and, if necessary, recoding this existing data (Creswell, 2013; Tesch, 1990). This process is known as triangulation, which I describe in greater detail later in this chapter.

Here I have outlined and described the particular elements of the research design that I employed in this study. I selected a qualitative case study research design in order to examine key stakeholders' experiences of a workshop in their real-world context utilizing various research methods and with an emphasis on subjectivity. In the next section, I describe the research methods utilized to gather data for this investigation.

RESEARCH METHODS

In utilizing narrative case study for this research, fieldwork is central to gaining a fuller and richer understanding of the stakeholders' experiences. Merriam (1998) suggests interviews and observations as the primary forms of data collection for case study. More specifically, case studies in educational fields tend to utilize interviews most heavily (Merriam, 1998). While interviews with the stakeholders were useful in gathering the narrative experiences of the stakeholders' *from their perspective*, the reliability and honesty of the their narratives can easily be influenced by a number of factors (Cohen, Manion, & Morrison, 2004). However, I felt that in this particular case, the benefits of utilizing this data collection method outweighed its drawbacks. First, as previously mentioned, interviews allow the study participants to construct their own meaning (Merriam, 1998)—which is the primary interest of qualitative researchers. Secondly, interviews allowed both parties to clarify any miscommunications or misunderstandings

of questions and/or answers (Cohen et al., 2004). Finally, interviews offer what Merriam (1998) describes as a continuum of structure. Because my goal was to assess what the stakeholders' valued, semi-structured interview questions gave a jumping off-point for the conversation while allowing the stakeholders to talk about whatever aspects of the workshops were of most interest to them personally.

While there is similar continuum to structuring observational fieldwork, I chose to utilize less "systematic" observations and, instead, simply engaged in "participant observation" in which I recorded each of the three workshops as they unfolded in the participants' natural setting—the Blanton Museum of Art, which was either a place of work or study for each of the participants (Cohen et al., 2004, p. 211). I recorded my observations utilizing field notes, photographs, and audio recordings of the workshops. Not only do these observations provide my research with contextual understandings for the interviews, but I also gain data that can be analyzed for themes relating to my research question.

In summer, my fieldwork and data collection methods relied on two approaches: observations and interviews. I felt each of these methods would enable me to understand, as much as possible, the experiences and values of the key stakeholders from their perspective. Because observations of the student participants occurred in a public space and their participation required by their courses, recording their likeness in photographs, field notes, nor voice recordings did not compromise their academic standing. However, I was concerned that the student stakeholders that I selected for interviews might feel pressured to value the program positively out of a concern for their academic standing in the class. While a bit of stakeholder bias is inevitable for reasons discussed more thoroughly in my Limitations section, I thought that maintaining the students' complete

anonymity would alleviate any pressure and minimize bias within their interview responses about their perception of the workshops' value.

Observations

On August 22, 2017; April 10, 2018; April 24, 2018, I observed the first sessions of each of the three workshops for Dell Medical School students at the Blanton Museum of Art. While those present at each of these sessions varied a little due to some student and Mentor absences, it was mostly the same 15 students, 3 DOCS mentors and, of course, the 2 Blanton educators. With permission from the workshop administrators, Dr. Ray Williams and Dr. Alejandro Moreno, I maintained thorough field notes, audio recordings, and photographs of the sessions as a means of documenting my observations so that I could better remember, transcribe, and interpret the actions and words that I witnessed. I knew that this observational data would be useful in comparing and substantiating the data I would later glean from interviews with my selected key stakeholders.

Interviews

While I chose to utilize more informal, unstructured interview methods for my research, I prepared for the interviews by creating a semi-structured list of questions to guide the conversations with key stakeholders. It was important to me, however, that the guide not limit the selected interview participants in their perspectives, but simply inspired their discussion of most interesting and relevant to their unique perspectives throughout the conversation. The questions included in these interviews were tailored to the specific stakeholder being interviewed and different information was emphasized depending on the individual stakeholder's role and experience in the workshop. Because my research question is concerned with the perspectives of a variety of workshop

affiliates—from student participants to faculty administrators to museum educators—I wanted to make sure my interview questions were successful in capturing their unique roles and experiences in and of the workshops.

While my interviews with Dr. Ray Williams and Dr. Alejandro Moreno occurred in person, I was unable to conduct in-person interviews with the selected student participants as I moved overseas during the summer of 2018. Because I did not want my distance to skew my data collection, I arranged phone calls with the students in which I asked the personalized interview questions. Once those questions had been answered, I sent the students a written transcript of my questions and their responses that they then fact-checked and edited as they saw fit, in order to ensure that the data they shared with me was unaffected by possible misunderstandings that can occur when not communicating face-to-face. Because I felt this form of member checking was successful in improving the trustworthiness of my interview data with the students, I completed the same process with Dr. Williams and Dr. Moreno by sending them transcripts of our interview conversations for member checking. I felt this process increased the consistency and validity of all of my interview data. Below, I provide a list of generalized sample questions I utilized in guiding each of the conversations, however, some data was gleaned by questions I did not prepare in advance (and that are not listed below), but that arose as the conversations unfolded.

Sample Questions

Below, I have included a series of questions that guided my semi-structured interview with each key stakeholder. While the primary goals of these interviews was to empower the stakeholders to openly share their own experiences and thoughts relating to

the value of the workshop, preparing a list of questions before the interviews helped to ensure that the conversations remained related to my central research questions.

Interview with Dr. Ray Williams, Director of Education and Academic Affairs at the Blanton Museum of Art at The University of Texas at Austin.

- Can you tell me a bit about your role at the Blanton Museum of Art?
- Please briefly describe the program you've helped design for Dell Medical Students (as if for someone unfamiliar with the program).
- What inspired/initiated this collaboration?
- How was this collaborative program designed? What did that process look like? What was your involvement? What was the involvement of administrators at Dell Medical School?
- Before the program's implementation, what were the expectations, goals, and objectives that you hoped it would achieve?
- Was the program evaluated (formally or informally)? If so, how?
- In your opinion, how successful was the program in achieving these expectations, goals, and objectives after that first year (Fall 2016-Spring 2017)?
- What specific elements of the program, if any, did you think were most successful?
- What specific elements, if any, did you feel were least successful? Were any elements of the program changed after the first implementation?
- Do you feel the art museum environment (staff included) was necessary for the program's success? Why or why not?

- Do you believe that these students benefit from arts-based learning (academically, professionally, personally, etc.)? Why or why not?
- How does this program accomplish the Blanton Art Museum's mission?
- What value (if any) do you place on teaching medical students (and professionals) about the arts? Has working with this audience influenced you personally, professionally, and/or academically?
- Please describe your current attitude toward the incorporation of arts-based teaching strategies into medical education. Has your attitude changed since the program's initial implementation in 2016-2017? If so, please describe how.
- Please describe your current attitude toward partnerships between of arts and medical institutions. Is this partnership mutually beneficial? If so, how?

Interview with Dr. Alejandro Moreno, MBBS, MPH, Assistant Dean and Director of the Department of Medical Education & Associate Professor of the Department of Internal Medicine at the Dell Medical School at The University of Texas at Austin.

- Can you tell me a bit about your role at Dell Medical School?
- Please describe what DOCS program is (as if for someone completely unfamiliar with the program).
- What is the Blanton Museum of Art's involvement with DOCS students? What inspired this collaborative program?
- Can you talk about how this collaborative program was designed? What did that process look like? What was your involvement? What was the involvement of administrators at the Blanton Museum of Art?

- Before the program's implementation, what were the expectations, goals, and objectives that you hoped it would achieve?
- In your opinion, how successful was the program in achieving these expectations, goals, and objectives after that first year (Fall 2016-Spring 2017)?
- What specific elements of the program, if any, did you think were highly successful?
- What elements, if any, did you feel ought to be changed?
- Do you feel the art museum environment (staff included) is necessary for this program's success? If yes, please describe which elements of the environment specifically. If no, please describe why not.
- Do you believe that arts-based learning contributes to the success (academic, professional, personal, etc.) of these student participants? Why or why not?
- What value (if any) do you place on learning about the arts? Has arts-based learning influenced your life personally, professionally, and/or academically?
- Please describe your current attitude toward the incorporation of arts-based teaching strategies into medical education. Has your attitude changed since the program's initial implementation in 2016-2017? If so, please describe how.
- Please describe your current attitude toward partnerships between arts and medical institutions. Is this partnership mutually beneficial? If so, how?

Interviews with Anonymous First-Year Students of the Dell Medical School at The University of Texas at Austin.

- Generally describe your experience of the DOCS workshop series at the Blanton Museum of Art in which you participated in your first year of Dell Medical School, 2016-2017.
- Since your completion of the workshops, what aspects of the sessions have been particularly SURPRISING, MEMORABLE, and/or RELEVANT to your concerns as a physician-in-training?
- Since your completion of the workshops, is there anything you wish the workshops had taught, covered, discussed? If so, what is it and why do you feel this should be included in the workshops?
- Have you returned to the Blanton since your completion of the workshop series? If so, what were your reasons for going? Can you describe your experience of that visit?
- General comments about the overall value of your experience of the workshops. Since your completion of the workshop series in Spring 2017, has your perception of its value changed or stayed the same? Please explain.
- Generally, do you feel that your experience of these workshops has in any way influenced you academically and professionally 1.5 years later? If so, in what ways?

DATA ANALYSIS

The goal of data analysis is to form an overall meaning of the content collected and identify concrete themes in attempt to understand and explain the phenomena studied. Creswell (2014) describes the process as “segmenting and taking apart the data (like Peeling back the layers of an onion) as well as putting it back together” (p. 195).

The deconstruction of raw data is necessary in order to interpret the data in a meaningful way. Creswell (2014) offers a series of interrelated steps to follow in guiding the data analysis process for a qualitative study. This process involves collecting and organizing raw data; organizing data, reviewing data, coding the data in order to identify themes; interrelating the themes in a narrative analysis; and then interpret the meaning of these themes (Creswell, 2014). In a sense, the goal of the final step is to answer the question, “What were the lessons learned?” (Lincoln & Guba, 1985) and intertwines the researcher’s own experiences, history, and culture.

After the initial data collection phase of this research, I was left with a multitude of field notes, recordings, and photographs from firsthand observations from which to draw meaning. Because data analysis in case studies begin with the initial observations, but continue until the final interpretation is written (Stake, 2010), I knew that any emergent themes from Phase I of my data collection (firsthand observations) would be subject to change based on my findings from Phase II of my data collection (interviews). Some themes were clear from my observations and these acted as my jumping off point for the organization and categorization of my data. First, I organized the observational data by workshop and then by activity or discussion. While this process organized most of my data, I found some outlying data that was difficult to fit within this framework. I completed this same process after Phase II of my data collection, organizing all transcribed interview content by workshop, then further organizing by activity or discussion. Once again, there was some data that simply could not be categorized in this manner, so I questioned the effectiveness of this organizational framework. However, I recalled that the data analysis process would likely shed light on some themes and clarify other potential ways for categorizing the data (Clandinin & Connelly, 2000; Thomas, 2003).

Once my data was semi-organized (and not as overwhelming), I began the process of inductive data analysis in identifying “patterns, categories, and themes” from my field notes, voice recordings and photographs of my firsthand observations of the workshops as well as interviews conducted with the workshop’s key stakeholders—student participants as well as workshop administrators from the Blanton Museum of Art and Dell Medical School. Inductive analysis involves the collection of raw data and information that links the research question to the findings through the identification of codes or themes which are not predetermined and evolve throughout the analysis process (Thomas, 2003).

I highlighted keywords, phrases, and comments from my field notes and transcriptions that indicated a stakeholder particularly valued a workshop experience—data of this nature was deemed significant. I utilized my photographs of the workshops as a means of adding visual to my field notes, looking at the expressions of the photographed stakeholders to elucidate their emotional responses to particular workshop events. Because many themes emerged as I analyzed the observational data, it gave me a clearer idea of what themes to look for in the interview data I was to analyze next. However, I also understood that there would likely be some new data that would emerge from the interviews and that this would be very much a back-and-forth process of analysis (Clandinin & Connelly, 2000). Color-coding helped to organize significant data, however, after much comparison and further analysis, I discovered some categories and patterns could be consolidated into a single category as the data expressed a shared theme. This consolidation of data made it easier for me to understand the larger themes and values that my stakeholders expressed, findings which were central to answering this research question.

Once I had named the themes that I felt best encapsulated the emergent connections and patterns presented by the data, I realized that the themes shared many commonalities with the five unique features of the arts and arts learning, which I described in my review of literature. Therefore, I named my themes after each of Davis' (2008) five unique features as they best described the aspects of the workshop experiences that stakeholders seemed to value most.

Triangulation and Validity

In order to assess the accuracy of my findings, I utilized data triangulation as a means of strengthening the validity of my study. Triangulation involves examining evidence gathered across sources in order to justify the identified themes. Creswell (2014) states that themes identified from the convergence of several data points improve the validity of the study. While I engaged in triangulation throughout the analysis process by referring to and from each of the data sets (Phase I observational data and Phase II interview data), I believed it was important to triangulate my final thematic findings as well. This process involved returning to my data and looking for supporting evidence *across* multiple data sets. In other words, I set several other criteria for determining themes amongst my data. First, the theme had to be supported by data from both of my research methods—my observational field notes and interviews. Second, the theme had to be supported by data from multiple interviews.

This process of triangulation ensured that my findings were supported by both observational *and* interview data. Additionally, I made sure that each of my thematic findings was supported by data from more than one stakeholder. This process of triangulation enhanced the validity of my findings from both sets of data and therefore verified my five thematic findings.

CONCLUSION

In this chapter, I have presented a detailed description of the particular research approach utilized in this study. Furthermore, I defined and described the research philosophy, design, and methods that comprised my research approach. This study employed a narrative case study research approach utilizing direct observation, and semi-structured interviews with key stakeholders of the workshop in question as my methods of data collection. I emphasize the narrative data and lived experience of the stakeholders who participated in my research, as their unique perspectives of the value of their workshop experiences were central to investigation. While I have concluded this chapter with a discussion of *how* my data was analyzed, I delve deeper into the thematic strands that emerged during the analysis phase of my research and the meaning of these findings in Chapter 5, entitled Data Analysis.

In the following chapter, Chapter 4: Situating the Study, I describe the primary institutions and individuals involved in the design and implementation of this workshop series. I spend a significant amount of the chapter describing the workshops in rich, narrative detail from my point of view as an observer of the workshops throughout Fall 2017 and Spring 2018.

Chapter 4: A Workshop Series for DOCS Students at the Blanton Museum of Art

CHAPTER INTRODUCTION

According to Alejandro Moreno, M.D., (personal communication, July 27, 2018) the workshop series for Dell Medical Students at the Blanton Museum of Art began in the fall of 2016, before the first cohort of medical students would arrive. Clarissa Johnston, M.D., Associate Professor of Internal Medicine and Medical Education at Dell Medical School, had learned that Dr. Ray Williams, a pioneer in art museum programming for medical students, was Director of Director of Education at Blanton Museum of Art on The University of Texas at Austin campus and only a few blocks away from the newly built Dell Medical School.

Dr. Johnston proposed to the Dell faculty that they approach Dr. Williams about ideas for a potential collaboration. In a meeting lasting “the whole afternoon,” (Moreno, personal communication, July 27, 2018) educators at both institutions began envisioning what came to be a three-part workshop series at the Blanton Museum of Art. This investigation studies the workshop in its second year of implementation. I felt this was a significant time to research this program as any issues that might have arisen during the workshops’ pilot year had likely been addressed, therefore the second year of the workshop would be more representative of the program going forward.

In the following paragraphs, I describe each institution and the key administrators who are associated with the workshop series. I also describe the Dell Medical School’s Demonstrating Outstanding Curriculum Skills (DOCS) Curriculum, of which this collaborative workshop is part. Finally, I conclude this chapter by providing a detailed description of the workshops as I observed them in Year 2. This description is

intended to give the reader supportive context for the interpretation that I provide in Chapter 5, Data Analysis.

THE BLANTON MUSEUM OF ART

The Blanton Museum of Art is located on the campus of The University of Texas at Austin. According to the Museum's website, it is considered the "primary art collection for the city of Austin... [and] is a major resource to the community" (Blanton Museum of Art, n.d). Boasting nearly 18,000 works of art in its collection that range from ancient Greek pottery to contemporary American works as well as traveling exhibitions of a wide variety, the museum has "the most comprehensive collection of art in Central Texas" and appeals to a wide range of visitors.

The Blanton's mission statement is difficult to find on the Museum's newly renovated website. However, the website stated that the Blanton "offers thought-provoking, visually arresting and personally moving encounters with art" (Blanton Museum of Art, n.d.). As an entity of the University, another source offered that the Blanton's role is to "showcase the University's commitment to an education in the arts and its mission to benefit greater society by providing access to an exceptional fine arts museum" (McKinnell, McKinnell, & Wood, n.d.). Furthermore, the Blanton's vision statement claims the following: "We believe that art matters. Our aim is to provide visitors with engaging and memorable gallery experience that will motivate further exploration" (Lee, 2016).

Curriculum Connections and Class Visits

The Blanton considers itself an extension of the classroom for a variety of disciplines. The Museum's websites states that, "Blanton educators are available to help design customized class sessions" in order to "enhance student understanding of course

content and achieve desired learning objectives” (Blanton Museum of Art, n.d.). The Museum facilitates visits from a number of departments throughout the university including, but not limited to, English, geography, mathematics, music, religion, social work, pharmacy, political science, and geography—many of which the faculty collaborate in designing with Blanton Education staff. Through “sustained close looking, open-ended questioning, and active learning techniques,” the Blanton’s educational class visits aim to “advance critical thinking, problem solving, oral communication, visual literacy, and... mindset skills” (Blanton Museum of Art, n.d.).

Dr. Ray Williams, Director of Education and Academic Affairs

Before relocating to Austin, Dr. Ray Williams held the position of Director of Education at The Harvard University Art Museums. There, he shared the goal of establishing the Art Museums as “an educational and cultural resource for both the University and the community” (Harvard University Art Museums, 2007). Earlier in his career, Ray served as Director of Education at the Rhode Island School of Design where he taught museum education courses and developed workshop series for healthcare workers in hospice centers.

In 2012, Dr. Williams was tapped to become the Director of Education and Academic Affairs at the Blanton Museum of Art at The University of Texas in Austin. In this role, Dr. Williams “leads a team of 6 museum educators and 40 volunteer gallery teacher, participates, in senior management team, leads interpretive programming related to special exhibitions in partnership with curators, leads gallery experiences for mostly graduate students and other adult audiences such as health care professionals, teachers, and individuals in cognitive behavioral therapy, the latter of which involves close

collaboration with mental health professionals and specialists (personal communication, May 10, 2018).

Most relevant to this thesis, is his role in working with health care professionals. Dr. Williams has established himself as a leader in the emerging trend of collaborative art museum programs for medical schools, work he began while at Harvard Art Museums in a program that focused on developing “doctor-patient communication, inter-professional teamwork, and preventing burnout” (Blanton Museum of Art university report, 2017).

From the very beginning of our interaction over email, my initial impression of Dr. Williams was that he is a deeply thoughtful and kind person. Upon first talking with him in person in Fall 2017, I noticed that despite his somewhat intimidating height, he is indeed very friendly and gracious. For instance, almost immediately upon introduction, he asked that I refer to him as Ray, which I will do throughout the remainder of this thesis. Ray and I conversed over tea in the Blanton Café across from the Museum and discussed several of the current projects or programs he is developing for the Blanton—each of which he is very excited about. However, what immediately stands out to me is that each of the projects Ray describes address issues of mental and/or physical health. When I point this out to him, he states that empathy, emotion, and mindfulness or “self care” have become a major theme in his practice as a museum educator.

Siobhan McCusker, Educator for University Audiences

While I do not focus on Siobhan for this study, it is important to note her role as Ray’s facilitator and collaborator in this particular workshop series. Siobhan serves as the Educator for University Audiences, which involves close collaboration with The University of Texas at Austin faculty and students in “providing custom-designed gallery experiences that respond to course goals.” (University programs, n.d.). Ray said he

wanted Siobhan’s involvement in the program due to her “calm demeanor and experience crafting unique experiences for a wide range of university audiences” (personal communication, May 10, 2018).

In Spring 2018, I also discovered that Siobhan is beginning a new collaboration with the collaboration with BeVocal, a bystander intervention initiative at The University of Texas. As part of this collaboration Siobhan will design and lead workshops and experiences for first-year students that “create a culture of caring for each others’ well-being while also building critical thinking and visual literacy skills, oral communication and empathy” as part of a new collaboration with BeVocal, a bystander intervention initiative at The University of Texas (“Signature Courses Collaborate,” 2018). Much like the workshop series for Dell Medical Students, “The program hopes to contribute to a community that engages and invests in the safety and well-being of others” (“Signature Courses Collaborate,” 2018).

THE DELL MEDICAL SCHOOL

In 2012, Travis County in Austin, Texas voted in favor of increased local property taxes in order to fund a medical school. In June 2016, the Dell Medical School opened its doors to its first class of 50 students. The mission of the Dell Medical School is to revolutionize how people get and stay healthy by achieving the following goals:

“improving health in our community as a model for the nation, evolving new models of person-centered, multidisciplinary care that reward value; accelerating innovation and research to improve health; educating leaders who transform health care; and redesigning the academic health environment to better serve society” (Dell Medical School, 2018).

Dell Medical School prides itself as “the first medical school in decades to be built from the ground up at a top-tier research university” (Dell Medical School, 2018).

Its revolutionary four-year curriculum plan focuses on “unprecedented community support, a value-focused model, groundbreaking curriculum, and person-centered care” (“Texas Dell Med First Class,” 2016).

In Year 1, students focus on the essentials of the pre-clinical curriculum in an accelerated 12-months focusing on “active learning, problem-solving and critical thinking.” In Year 2, students of Dell Medical School apply the clinical skills acquired during Year 1 to practice during clerkships within local hospitals and clinics, which occur in six eight-week rotations. In Year 3, students are given nine months to explore an area of personal interest, applying their skills toward a personal goal that benefits the Central Texas community. Finally, in Year 4, students begin the transition to residency, participating in rotations, internships, and electives that allow them to explore career interests and continue building advanced clinical skills.

What stands out as stellar about the Dell Medical School and its curriculum is the focus on community. “By participating in the community and preventative medicine programs, students will experience the community component of learning and medical education while helping to fill gaps in community access and outreach” (Dell Medical School, 2015). Additionally, the school states that it celebrates the “diversity, creativity and innovation around us and are connected in deep and meaningful ways to the greater Austin and Travis County communities” (“Texas Dell Med First Class,” 2016). This is evident in their many partnerships with physicians, nonprofits, and entrepreneurs on and off campus.

Alejandro Moreno, MBBS, MPH, Assistant Dean and Director of the Department of Medical Education & Associate Professor, Department of Internal Medicine

Alejandro Moreno has a dual academic background in medicine and law and currently practices as a physician, educator, and attorney. His research has focused on the care of refugees and victims of torture and has testified as an expert witness in numerous cases involving human rights violations. Moreno currently serves as the director of Dell Med's four-year course that teaches physical diagnosis and clinical skills. The course is titled Demonstrating Outstanding Clinical Skills (DOCS) and is described in the following subsection.

Upon meeting Moreno in July 2018, he mentioned how one semester of music and one semester of art appreciation were required as part of his own medical education at both Boston University and Ciencias de la Salud in Medellín, Colombia. He claims that, “the reason was because it created some set of skills that are parallel to medicine... for instance in music, we have to auscultate many things—heart sounds, rhythms... so, with music, the idea was to get familiar with that. It's the same thing with observing and describing artwork in art appreciation” (personal communication, July 27, 2018). Moreno sites these beneficial experiences as his inspiration to involve art in the new Dell learning experience as part of the DOCS curriculum for first-year students.

Demonstrating Outstanding Clinical Skills (DOCS) Curriculum

DOCS is a longitudinal four-year course in which students hone diagnostic and clinical skills in small teams consisting of one faculty mentor assigned to a group of five students. These groups are intended to facilitate “deep time spent learning from an experienced practitioner” so that students can become “compassionate and effective physicians” (Dell Medical School, 2018). In short, says Moreno, “We get the diamonds in the rough and DOCS polishes them” (personal communication, July 27, 2018).

In the first year of the program, students meet with their mentors on a weekly basis with the goal of learning how to interact with patients—“So, how to take a history, how to relate to the patient, how to do an exam, etc.,” Moreno states (personal communication, July 27, 2018). Three times throughout this year, students participate in a workshop series that focus on Observation skills (Visual Literacy), Empathetic Communication; and Mindful Practices to Avoid Burnout.

The goal of the second year is to address the factors that may not be “directly involved in patient-physician interactions, but definitely influence that communication and that relationship---such as burnout, ethics, bias, and empathy erosion” (personal communication, July 27, 2018). Local community partners are highly involved in this part of the students’ education, which focuses on patient-physician communication and relationship-building. Moreno describes the students’ collaboration with a family support group for children with cancer. The goal of the collaboration is for the students to hear the experiences of the families in receiving the news that their child has cancer. “So they will hear it from the families firsthand—‘I’m a patient, this is what I felt when the doctor told me, you know, you have colon cancer, it has spread or it has not spread’,” Moreno explains (personal communication, July, 27 2018).

In the third year, students pursue their leadership or scholarly projects, therefore the students’ exposure to the clinical world is limited to their clinical practice in primary care for family and community medicine with the opportunity for added electives.

By September of their fourth year, students have identified their individualized and specialized interests and must submit their applications to residency—a very critical point in their medical school career. Students aim to get good letters of recommendation from the institutions they preferred during their rotations. Students also begin learning medical procedures so that they can apply their learned clinical skills. “If you’re rotating

and you're able to join in a procedure or *help* in the procedure," Moreno states, "then you appear more engaged and show that you have clinical skills and it will benefit your recommendation" (personal communication, July 27, 2018)

ABOUT THE BLANTON WORKSHOP SERIES FOR DELL MEDICAL STUDENTS

The following subsections provide a detailed description of the workshops based on direct observations, field notes, photographs and voice recordings that I gathered during Phase I of my data collection process. I wrote these sections in a semi-narrative form as if telling the story of the workshops as they unfolded in Fall 2017 and Spring 2018, the second year of the program.

Structure

The 2017-2018 cohort of 50 Dell Medical School students was broken up into three groups of approximately 15, 15, and 20 first-year DOCS students and 3, 3, and 4 DOCS mentors respectively. Each of these small groups came to the museum three times throughout their first year. The visits were spaced so that groups come for their the first visits in August, second visits in January, and third visits in April. For this study, I only observed and interviewed participants in the first of these groups to visit three times throughout the year. The educators at the Blanton Museum of Art who lead the program are Ray facilitated by Siobhan McCusker, the Museum Educator for University Audiences.

Session 1: Visual Literacy

The first of the three sessions focused on developing students' visual literacy (or observational) skills in order to improve their physical diagnosis abilities in their clinical practice. The students and workshop administrators gathered in the Blanton's atrium space where the museum educators, Ray and Siobhan, introduced themselves, the

Blanton, and the workshop. “This is not a museum tour,” Ray said, “Instead, this is a workshop specially designed for you as medical students and future physicians. Art is about lived experience.” He explained, “This includes life, death, love, loss, illness—things you will encounter in your future careers.” The students then discussed the role of observation in medicine, offering their own insights regarding the workshop’s theme.

Throughout the session, the students engaged in discussions and activities in which they described and interpreted visual information presented in selected works of art. One of the activities involved describing paintings to a blindfolded partner who then had to picture the painting in his or her mind. Another activity took this idea further by having one of the partners draw the contents of a work of art purely based on their partner’s verbal description, without looking at the painting until the activity had ended. Ray engaged the students in discussions of artworks in which he encouraged students to build their own unique narratives based on purely visual information. These discussions typically ended with Ray adding contextual information in order to add meaning to the visual information.

The sessions emphasized the importance of considering multiple interpretations and how different people, because of their unique personal experiences and backgrounds, can bring different meaning and interpretations to works of art. On the other hand, the sessions also discussed the role of contextual information, and how when supplemented with visual cues, can strengthen your understanding of a work of art (and perhaps a patient’s condition or symptoms).

Session 2: Self-care & Preventing Burnout

The second session of the workshop is centered on the idea of self-care in an effort to improve the mindfulness and resiliency of medical students’ (and future doctors)

so that they are less likely to experience physician burnout. This session began with a warm-up exercise in which Ray scaffolded prompts that increasingly encouraged the students to share their personal experiences and emotions related to school and their line of work. The warm-up concluded with a discussion of self-care and what “resilience” means. Ray read a list of character traits of resilient people and asked students to identify one characteristic they already possess and one they hope to strengthen. After sharing, Ray explained the workshop’s relevance to the students. “Developing resilience in students is currently a top priority for medical school faculty and curriculum,” Ray stated before sharing some research on the increasing burnout rates among medical students and physicians. The group discussed the idea of “work-life balance,” which assumes that work depletes you while life restores you. Ray asked, “What if work also nurtured you? What if we could change our mindsets and values to where we see work as less of something to endure and ‘get through,’ and more of something we enjoy, savor and cherish?”

Learning occurred in a variety of formats within the galleries—large groups, small groups, and individually—in order to appeal to a range of learning styles. To begin, the students were first tasked with finding a particular detail within a large and chaotic painting. Unbeknownst to them, the detail wasn’t actually in the painting and the exercise was meant to see how well students deal with the frustration of “not knowing.” Afterward, the students were divided into small groups and assigned to separate galleries and artworks. Each work of art closely related to the idea of identity. In their small groups, students were given handouts with prompts and contextual information about their assigned artwork in order to guide students’ consideration of their own identities and how that might affect their perceptions, interactions, and medical treatment of others.

Next, students were given time to independently explore the galleries and select works that reflected a particular joy and struggle that they have experienced in medial school. Volunteers were asked to share their chosen artworks. This particular activity focused much less on understanding the artworks' context and content, but instead on students' formation of personal and emotional connections to the artworks. This activity concluded by students regrouping around a large, circular floor installation in what the educators termed a "Gratitude Circle." The educators led the students through a few breathing exercises and asked the students to silently become aware of their current thoughts and emotions. Next, Siobhan asked the students to write "one thing about your work that makes you feel gratitude," after which some students volunteered to share.

Session 3: Empathetic Communication & Reducing Bias

The focus of the third and final workshop session was to facilitate students' awareness of their own learned biases and to guide the students in reducing this bias. "Art can give us some practice in exercising the empathetic imagination," Ray explained, "It incites curiosity, encourages listening, and can motivate us to let this empathetic way of thinking influence and guide our actions." The introduction concluded by asking the students to read quotes about the importance of empathy from prominent figures such as contemporary and historical presidents, philanthropists, authors and actors.

Next, in the European galleries, Ray began with a group discussion around a painting of David with the decapitated head of Goliath. He asked the students to put themselves into the situation unfolding in the painting. Students took turns describing the facial expressions on each subject's face within the artwork. Then, Ray asked them to imagine what each of the subject's lives must be like—before, during, and after the moment depicted in the painting. The students' discussions illustrated how there are

always multiple sides to a story, how our own experiences affect the way we perceive others’ and how, there is always some element on common ground between two humans—sometimes it might just be harder to find than others. Throughout the session, the group engaged in similar discussions, however, the museum educators and DOCS Mentors increasingly challenged the students to imagine the subjects in the artworks as patients. Throughout the workshop, students seemed to be imagining themselves as doctors responsible for treating the subjects of the artworks they viewed, again, exercising their empathetic imaginations, but in a real-world context.

For the next activity, the students were divided into small groups with one DOCS Mentor. Without any contextual information about the piece, the students were tasked to generate a narrative surrounding the situation and the people depicted within the artwork. After several moments, the students gathered and shared each group’s narratives with the others. Afterward, the students all gathered around a final artwork depicting hundreds and thousands of people working within a gold mine. While the piece is intended to call attention to issues of consumerism, Ray used the piece to illustrate the process behind people rather than products. Ray related the idea to the medical context by encouraging students to ask, “How did this person get here? Where did they come from? What have they been through?”

Finally, Ray concluded the session by gathering the students into the Blanton’s Meredith Lounge, a round reading room in the center of the upstairs gallery. He and Siobhan passed out sketchbooks and pencils and asked students to respond to the following prompts: How do I want empathy to manifest in my own work as a physician? How might I resist the erosion of empathy over time? As students completed their reflections, Ray distributed a Gratitude Journal created by The University of Texas at Austin Center for Mental Health, “designed to prompt you to reflect on things that make

you feel grateful.” The journal is filled with writing and drawing prompts, encouraging quotes, meditative activities and puzzles, and more.

CONCLUSION

In this chapter, I have provided the reader with a description of the two institutions involved in this study—the Blanton Museum of Art and the Dell Medical School at The University of Texas. I have discussed the key administrators and programs associated with the workshop series and described their roles at each institution. Finally, I have provided a brief, but detailed description of each of the three workshops in the series as I observed them in Year 2 in order to facilitate the readers’ contextual understanding of this study. In Chapter 5, Data Analysis, I discuss the findings and interpretations that resulted from this narrative case study research into the workshop series.

Chapter 5: Data Analysis

CHAPTER INTRODUCTION

The previous chapter described the context and structure of the workshop series at the Blanton Museum of Art for first-year students of the Dell Medical School as I observed it in Fall 2017 and Spring 2018. In this chapter, I present my analysis and interpretation of the major themes that emerged from my observations of the workshops and from interviews with key stakeholders. First, I provide how existing literature, particularly that of arts educator and psychologist Jessica Hoffman Davis (2008), shaped my interpretation, description, and definition of these emergent themes. Next, I draw on raw data gleaned from observations and interviews to support my key findings. Finally, I present my own concluding thoughts regarding what this research reveals about the Blanton's value and relevance within its community. The analysis recounted in this chapter primarily addresses my main central research question: How do key stakeholders perceive the value(s) of a collaborative art museum workshop for medial students? However, I was also interested in how these findings supported the value and relevance of the Blanton Museum of Art within its local Austin community—this question I address separately at the end of this chapter.

THE VALUE OF THE WORKSHOPS

What struck me throughout my careful readings of the data were the many similarities and connections to be made with Jessica Hoffman Davis' (2008) five "unique features of the arts and, what, on account of these features, students learn" (p. 49). As discussed in Chapter 2 of this study, Davis (2008) states that, "the arts are unique among school subjects because works of art feature the following: a tangible product, a focus on emotion, ambiguity, a process orientation, and a sense of connection" (p. 50). She also adds that each of these features leads to "10 specific and invaluable results of arts

learning” including, imagination and agency; expression and empathy; interpretation and respect; inquiry and reflection; and finally, engagement and responsibility respectively (Davis, 2008, p. 50). While Davis (2008) associates each of the aforementioned results of arts learning with a particular unique feature of the arts, she states that, “in another conversation, they might be rearranged... [Instead, they] exist together and inform one another” (p. 51).

In many ways, the following findings garnered through my case study of the Blanton Museum of Art workshop series for students of the Dell Medical School mirror and support the value that Davis ascribes to the arts and what they teach. As a result, I utilized Davis (2008) five unique characteristics of art and arts learning as the titles for the themes that arose from my data analysis: tangible process—imagination and agency; focus on emotion—expression and empathy; ambiguity—interpretation and respect; process orientation—inquiry and reflection; and connection—engagement and responsibility (Davis, 2008). The first theme, tangible product, involves the active making of something new and of the learners’ own invention that “is never right nor wrong” (Davis, 2008, p. 51). Secondly, emotion, entails identifying, expressing, reflecting on and learning about one’s own feelings and those of others. Ambiguity, the third theme, involves the discovery and celebration of multiple interpretations. In valuing ambiguity, stakeholders’ expressed a sense of respect toward their peers and emphasized teamwork and the strength of multiple and diverse perspectives. The fourth theme, process orientation, involves finding personal meaning by asking questions or inquiring. Finally, connection entails engagement in an activity or discussion the participant views as personally, professionally, and socially relevant and important.

My study primarily addressed the value(s) that the stakeholders’ ascribed to their workshop experience. I utilize the aforementioned unique features proposed by Davis

(2008) as the titles for each of the themes discussed in this chapter. Each theme is considered in separate sections in which I provide examples of the data supporting this thematic finding. Furthermore, my research was directed toward identifying the role that the museum environment played in the stakeholders' perceptions of the workshop's value. Finally, while not the focus of this research, I was also interested in learning how this data supported the Blanton's value and relevance within the Austin community. I address this matter separately at the end of this chapter and in the following chapter entitled Conclusion.

Tangible Product: Imagination and Agency

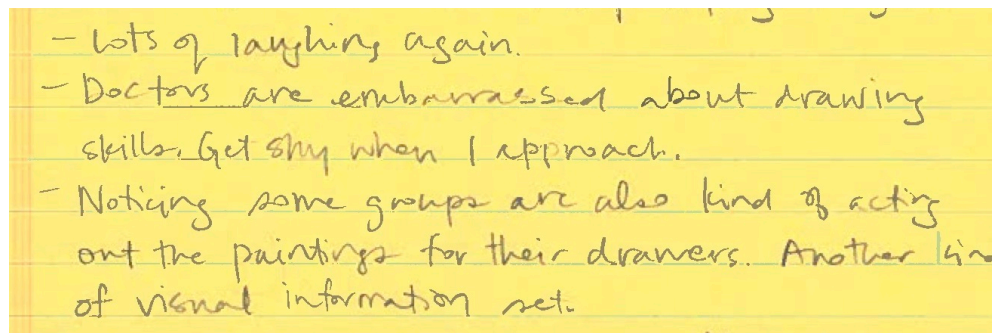
Introducing this first unique feature of art education, Davis (2008) states the following:

Art involves a tangible product... there is a something that we can see or touch or hear that we call art.... It is as true with art as it is with math and science that students gain skills for figuring out problems and discovering new information. And it is as true with art as it is with history or social studies that there is much knowledge to be gained about the subject when it is studied—factual information about which students' answers on a test are either right or wrong. But unlike other subjects, the arts allow [students] to create something new of their own invention that was not there before it was creates. And that something new and tangible—the product (even as it is a work in progress) can be changed or completed at the [student's] discretion.... Furthermore, the child's developing product, whether it is a painting, a dance performance, or an original song, is never right or wrong.... Even when we disagree with what we think the works are 'saying,' or don't like the way in which the work has been created, the work is not wrong. (p. 51)

During my firsthand observations, I noted several occasions in which the participants—students, DOCS Mentors, and museum educators alike—valued this moment of making, imagining, and then *owning* a tangible product.

This was particularly evident in the first workshop that focused on visual literacy. The students were paired and given the role of “Describer” and “Drawer.” The describer

was tasked with selecting a painting within the Blanton's European gallery (many of which are heavily figurative paintings) and describing the selected painting to their partner, the Drawer. The challenge was that the Drawer could not see the painting before or during the drawing process; he or she could only rely on their partner's description of the selected painting in completing the drawing. As I walked around the galleries and observed the interactions between each pair of students, I noticed that the students tasked with drawing were very shy about revealing their work to me. They seemed to conceal them from me out of embarrassment. In my notes I wrote, "Lots of laughing again... Doctors are embarrassed about drawing skills. Get shy when I approach" (Illustration 1).



- lots of laughing again.
- Doctors are embarrassed about drawing skills. Get shy when I approach.
- Noticing some groups are also kind of acting out the paintings for their drawers. Another kind of visual information set.

Illustration 1: Excerpt from field notes (personal communication, August 22, 2017).

However, what was interesting was that later, once the activity had drawn to a close and Ray and Siobhan gathered the students to discuss their drawings, this shyness disappeared. Instead, they were so eager to share their drawings with each other. One student, without any prompting, even held his up to the painting he was trying to draw and explained to the group why he drew certain things based on how he interpreted his partner's descriptive information. The students were audibly laughing and incredibly joyful while revealing their drawings (Illustrations 2 & 3). Admittedly, I do believe a good deal of the laughter stemmed from the fact that many of the drawings did not closely resemble the paintings and, therefore, it was sort of poking fun of the students'

artistic abilities (or lack thereof), but they were joyful, proud, and excited about their inventive products.



Illustration 2: Male students showing their drawings to the group.



Illustration 3: Students laughing while sharing their drawings.

While the exercise was primarily intended to teach the students about the value of communication, teamwork, and attention to visual detail, it seemed that another outcome

was the students' eventual agency over their drawings. The anxiety the Drawers showed during the drawing process likely stemmed from the students' apprehension to engage in a process they are not as familiar with and to which there is not a single "right" answer, unlike the science and medicine exams to which they would become accustomed. As a result, the process may have triggered a natural sense of competition and fear of "doing it wrong." The discovery that there could be multiple interpretations of the paintings and that there was no "right" drawing at all caused the students to eventually embrace their imaginative drawings and take ownership of their final artistic products.

Another observation was many of the students' unprompted utilization of performance in describing their chosen paintings to their partner (Illustrations 4 & 5).



Illustration 4: A student "performing" the painting for her partner.

Siobhan and Ray never mentioned that the students could or could not “act out” the paintings for their Drawers, so I found it impressive that the students embraced this imaginative, creative process of “performing” the paintings for their Drawers. I think in these moments, the students became aware of the value of artistic and visual mediums in expressing and communicating ideas that oftentimes cannot be fully communicated verbally.



Illustration 5: A student “performing” the painting for her partner.

One expressed high valuation of another one of the workshop’s art-making activities in which they made a tangible product. She described the power and beauty of a poem that one of her peers created in response to a work of art. The student said, “There was an extremely memorable moment when one of our classmates poetically captured the sense of a picture and it was beautiful” (personal communication, June 17, 2018). While the student I interviewed was not discussing a tangible product of her own, but

appreciating the tangible artistic product—a poem—of her classmate, I believe it still captures the value she placed on imagining, making, and owning (or in this case, appreciating) an artistic product.

Something worth noting is that the male students appeared to embrace their drawings and be more willing to share their drawn products with the group than the females. Additionally, the males and females both engaged in performative communication during the same activity in roughly equal amounts. Lastly, the poem mentioned in the preceding paragraph was made by a male student and, according to the interviewee's memory, shared with the group suggesting that the male student “performed” his poem, another artistic tangible product. Interestingly, despite all of this, only the female students I interviewed mentioned and placed value upon the art-making processes they experienced in the workshop.

Focus on Emotion: Expression and Empathy

Another unique aspect that I discovered key stakeholders valued from the workshops was what Davis (2008) labels a “Focus on Emotion” (p. 56), another feature uniquely found in the arts and arts learning. While all disciplines, like art, “are approaches to making sense of and advancing our knowledge of the world around us,” Davis (2008) argues, “only the arts are specifically directed toward expressing and sharing human emotion” (p. 57). Davis isn't the only one to call attention to the value of art's emotional capacity and how, by utilizing this emotional capacity, it can become a valuable learning tool. In his text *Art as Experience*, John Dewey (1934) refers to emotion as the “moving and cementing force” (p. 44) of learning experiences in that emotion engages the learner and provides the momentum for further exploration. In line with Dewey's ideas, Burnham and Kai-Kee (2011) claim that, “The encounter with

artworks is as much a matter of the heart as of the mind, that learning about artworks is motivated and held together by emotion as much as by intellect. Emotional involvement is a necessary precondition for awakening to a work's poetic possibilities" (p. 15).

Emotion was the most persistent theme present throughout the workshop series. In an effort to more clearly organize my many findings related to this theme, this section is divided into two subsections—Expression and Empathy. Expression entails moments in which emotion was experienced or expressed by a stakeholder (participant or administrator) as witnessed during my observations and/or communicated during an interview. Empathy entails moments when empathy, or an awareness and attention to the emotions of others, was experienced as witnessed during my observations and/or communicated during an interview.

Expression

Throughout my observations of the workshops and interviews, stakeholders seemed to value the expression of their own emotions most often during the Self-care/Preventing Burnout session. Ray began this session by discussing the idea of "work-life balance," which "assumes that work depletes you while life restores you" (personal communication, April 10, 2018). Ray then asked the students, "What if work also nurtured you? What if we could change our mindsets and values to where we see work as less of something to endure and 'get through,' and more of something we enjoy, savor, and cherish?" (personal communication, April 10, 2018). In a sense, from the very beginning, Ray asked the students to consider the emotions that their studies and their future medical profession might trigger, to be aware of those emotions (both the positive and the negative) rather than ignoring or, worse, suppressing them. He and Siobhan

encouraged students to let these emotions happen as temporary experiences, rather than as permanent states of being.

In an activity centered on a painting by Trenton Doyle Hancock entitled *Painter & Loid Struggle for Soul Control* (2001), I observed frustration among the students as they struggled to complete the activity challenge—finding a particular detail in the painting that, unbeknownst to them, didn't exist (see Illustration 6). During the activity, this caused some students to express impatience and frustration, not with each other, but with themselves for not being able to find the “right answer.”



Illustration 6: Students searching for details in *Painter & Loid Struggle for Soul Control* (2001) by Trenton Doyle Hancock.

Afterward, as the group reflected on how the activity made them feel, one student said, “It’s easy to get frustrated when I can’t find the answer right away or when a task takes longer than it should. But if I can learn to embrace that uncertainty, embrace not knowing for a moment... maybe, I’ll stop forcing an answer and learn to enjoy the search. Then, sometimes, a new or unexpected answer will emerge” (personal

communication, April 10, 2018). It was clear that this student valued this revelatory moment in which she reflected on how her feelings of frustration could perhaps be avoided if she approached the task differently. Throughout this activity and the many others during this particular session, I observed that Ray and Siobhan asked the students, “How did this activity make you feel?” or “How does this work of art make you feel?” This continually reminded and encouraged the students to reflect and become aware of their own emotions, to consider how art and art learning activities trigger feelings, and what can be learned from experiencing these emotions.

Another activity during the Self-care session in which the stakeholders seemed to enjoy and value the opportunity for personal expression of emotion was when students were asked to find a work of art in the Blanton galleries that expressed a joy as well as a struggle that they have felt during their time as medical students. Ray explained to the students, “We wanted to give you each time to spend time in the galleries on your own, and to explore any works that might’ve caught your eye. Also, we wanted you to reflect on the joys and struggles that you’ve felt in your line of work and study” (personal communication, April 10, 2018). Volunteers shared their chosen paintings with the group. One student chose a large painting titled *Ream* (1964) by Lee Lozano (see Illustration 7). “Sometimes, I feel very sharp, focused, and ‘on point,’ if you will,” she laughed, “but sometimes I also feel the pressure of being a woman in a male-dominated industry. The masculinity of this drill or tool reminded me of that struggle” (personal communication, April 10, 2018).

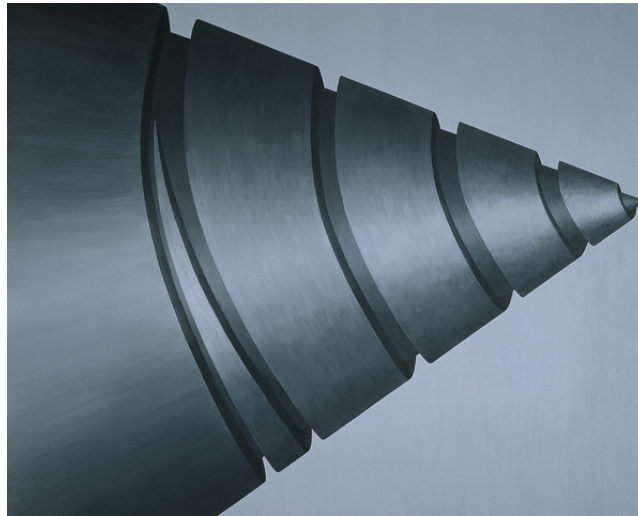


Illustration 7: *Ream* (1964) by Lee Lozano.

Another student selected a painting titled, *Two Legs* (1976) by Philip Guston (see Illustration 8). “The struggle this painting represents for me is facing these awful things in our practice. I read that the artist here was traumatized by the violence he witnessed in Vietnam and that’s what inspired this piece,” he said (personal communication, April 10, 2018). “I was disgusted by the painting at first and wanted to look away,” he continued, “but I realized that I can’t do that in my job. And that’s going to be challenging for me” (personal communication, April 10, 2018). After the students had shared their selected artworks and reflected on their own emotional experiences of medical school, a DOC mentor thanked Ray for giving the group space to be vulnerable in these workshops. “This vulnerability breeds teamwork,” the mentor said, “as we get to know each other as *people* and not just classmates” (personal communication, April 10, 2018).



Illustration 8: *Two Legs* (1976) by Philip Guston.

Finally, the workshop concluded with what Siobhan called a “Gratitude Circle” activity centered on a work of art by Polly Apfelbaum entitled *Townsville* (2000). “This work invites you to turn and face the center,” Siobhan told the students, “and to inhale and exhale in a way that feels most authentic to you” (personal communication, April 10, 2018). In this moment, I observed the students becoming calmer, more tranquil and peaceful. Some of the students sat or lied down after a few moments. Eventually, everyone had lied down, visibly relaxing while viewing the piece in silence (Illustration 9). Ray and Siobhan concluded the workshop around *Townsville*, but invited anyone to stay as long as they liked and were able. Despite the fact that the program had gone ten minutes over the scheduled time and the students were free to leave, an extended period of time passed before any of the students moved from the circle.



Illustration 9: Students participating in the “Gratitude Circle.”

During the interviews, one student said, “My experience at the Blanton workshops was the most calming thing I did all year. I have a hard time expressing how helpful it was to take time and space, to be still and contemplate... I love that we were encouraged to connect contemplation with Medicine” (personal communication, June 15, 2018). This same student shared that, upon revisiting the Blanton on her own after the workshops, she felt “extremely strong peaceful emotions tied to even pieces of art that originally drew out a lot of tension” (personal communication, June 15, 2018). Another student who was more skeptical of the value of the workshops initially stated, “I’m understanding more and more that it is so important to appreciate the moment. In the first year, it occasionally felt frustrating to take time out of the day to go do something that potentially didn’t help us become better clinicians, but in actuality... to take a small portion of the day to help yourself be better mentally and emotionally and improve less tangible clinical skills (communication, empathy) is just as important” (personal communication, June 17, 2018).

Ray commented on how surprised he was to discover how much the Dell Medical School faculty focused on developing self-care in the students' first year of studies, as in other partnerships, that issue was addressed much later (internship, residency). However, he said it became clear that the first-year students really valued and benefitted from being given space to breathe, relax, and reflect on their own emotions. "We hoped that the museum environment would be stimulating, freeing, and safe—different from the usual pressures, but relevant" (personal communication, November 15, 2018). Alejandro Moreno reiterated that, "The session on burnout is usually scheduled close to the winter break whenever everyone is actually feeling burnt out! So, this workshop's relevance and value to the students clicks right away" (personal communication, July 27, 2018). Ray added, "I am so very moved by the sometimes debilitating demands of the [medical] profession and the opportunity to support these young people in preparing themselves for this important work. And I think the museum environment is essential to this kind of work. It is very different in character from the students' usual environment, more beautiful and less charged with tension" (personal communication, November 15, 2018).

Empathy

There were several moments throughout my observations and interviews in which stakeholders expressed the value of the empathetic emotions elicited in the workshops. For obvious reasons, most of these moments occurred in the Empathetic Communication workshop as it was focused on eliciting what Davis (2008) terms an "empathetic perspective." However, while the Self-care session emphasized students' *own* emotional experiences, there were moments in which empathetic responses were drawn out by observing peers reflect or express their internal emotions.

For example, in the Self-care session, the students were in small groups and tasked with generating narratives about particular artworks. The prompts asked the students to consider who the subjects of the artwork were, what they felt, what they need and how they might be supported. Each of these activities required an empathetic perspective in order for the students to identify and consider the experiences and feelings of the artwork's subject. In one group, a student described the female figure depicted in George Segal's *Blue Woman in a Black Chair* (1981) (Illustration 10) as "relaxed, comfortable, peaceful" while another group member interpreted her as "tired, lonely, and



Illustration 10: Blue Woman in a Black Chair (1981) by George Segal.

sad." While their interpretations of the woman's expression differed, it was interesting to see how each student explained how their experiences influenced their interpretation of her emotion. As a result, each student seemed to empathize with the other's own unique,

emotional reactions to the artwork. During an interview, one of the students in that same group referred back to this moment:

I think the most memorable aspect of the workshop overall is the concept that people, like art, should be contemplated and appreciated for what they are. There was an extremely memorable moment when one of our classmates poetically captured the sense of a woman in sculpture and it was beautiful. Maybe it was more beautiful because he is so different-looking than the woman in the sculpture (he's a man), but he captured her emotion beautifully. It was this "part for the whole" experience of how much fun we were all having that he could put on her skin in a way. (personal communication, June 17, 2018)

As previously mentioned, the Empathetic Communication workshop was directly geared toward facilitating students' understanding of the value of empathy, especially in their line of work. The workshop involved many exercises in which the students viewed a work of art and interpreted the emotions expressed by the artist and/or the subjects of the artwork. As Davis (2008) puts it, by facilitating students' understanding that, "emotions are contained in and communicated through works of art" the workshops enable students "to learn about the feelings of the person who makes them, to think beyond themselves, and to consider the emotions of others" (p. 60). In interviews, students and workshop administrators recalled works of art that were particularly effective in eliciting empathetic emotion and illustrating its value. One student referred to *Untitled* and *Untitled*, two paintings from a series entitled *Strangest Fruit* (2013) by artist Vincent Valdez (Illustration 11). In these paintings, two Latino men are hyperrealistically painted against a solid white background. They seem to be floating in mid-air as their feet are dangling rather than flat against a surface. Their poses are odd in that their necks are craned as if slightly looking upward and the hands of each subject are clasped either in front or behind their waist. When one student in the group asked, "Why are their hands positioned this way?" another responded, "They're handcuffed, maybe? Because they're tattooed,

wearing baggy pants... it just seems like the characteristics that might scare an officer. Like Trevon Martin, for example” (personal communication, April 24, 2018). Another student added, “Yeah, like your stereotypical criminal” ” (personal communication, April 24, 2018). One of these students reflected on this conversation in an interview:

I remember observing a photograph depicting a Latino man seemingly hanging in a noose in mid-air. This was not a realization that I had come to upon first glance, however. I had first thought it was simply a man standing in the middle of white space, with his face downcast. Such a thought strongly influenced my initial interpretation of the painting. I imagined the man being weighed down by the burden of the stereotypes American society had placed on him. Given his dress and tattoo, I also caught myself immediately assuming he was a man who was familiar with incarceration. However, when my other colleagues astutely commented about the posture of the paintings’ subjects, I was shocked. Rather than representing simply the weight of being a Latino in an increasingly tense America, he presented the sick consequences of intense hatred against that race. I also found my initial assumptions of the subject’s history of incarceration to be false, reflecting some of the implicit biases that I have. Such biases could influence my treatment of such populations in subtle, unconscious ways. The exercise also challenged my empathy as I tried to imagine being the subject given my observations and inferences. (personal conversation, August, 2018)



Illustration 11: *Strangest Fruit* (2013) series by Vincent Valdez.

During another interview, a student recalled a collage by Deborah Roberts entitled *Skewered* (2017) (Illustration 12) and *Cruzando El Rio Bravo [Border Crossing]* (1989) by Luis Jiménez:

The most memorable sessions were those that encouraged us to view things from the perspective of another and to slow down and take in the details. I remember looking at a picture of a young girl put together with magazine clippings and it made me think about how young women put together their self-image. Another memorable moment was in examining a statue of an immigrant man carrying a woman, which led to me reflecting on the things people do for those we love and the risks we take for a brighter future. To understand these things is to understand the people we will work with and gain a better perspective on the condition we're tasked to treat. (personal communication, July 8, 2018)

Davis (2008) argues that, “Students who are encouraged to recognize and express their emotions in the making of art (I feel)” and to “identify with others’ feelings (you feel)” are well positioned to “imagine (what if?) and to pursue (because they are empathetic to others) positive alternatives for addressing the injustices around them” (p. 61; see also Greene, 1995, 2001).



Illustration 12: Students generate a narrative for *Skewered* (2016) by Deborah Roberts.

When I asked the same student whether he has applied what he has learned from these works of art to real-life situations since completing the workshops, he answered the question utilizing a reference to another contemporary painting, *The Broad* (2016) by Ramiro Gomez, as follows:

Since starting my clinical year, I've had much more interaction with a more diverse group of people than I've ever had in my life. I started on Women's Health, a majority of the patients I saw were pregnant, migrant women who spoke limited English. Working with them, I was taken back to a specific painting depicting a famous museum that had a small profile of a cleaning lady walking by with her cart. The series it comes from takes famous images and places the people who are responsible for aspects of it in the frame. In this case, we are reminded that the staff cleans the museum. I'm reminded of that picture in that I find working with this women brings a forgotten group of people directly into my viewing, and I'm forced to reconcile their social situation to find the best solutions for them... I feel that my practice, academically and professionally, has been affected by these workshops in that I try harder to see the perspectives of my patients... (personal conversation, July 27, 2018)

I asked the same question in an interview with a third student in an effort to understand whether (and, if so, how) she applies what she learned in the workshops. She referred to the research that she is already planning to do during her third year of the program in her response as follows:

I call my time at the Blanton to mind when I stop to study people, thinking about what I see and what I can't see. For me, this happens a lot in medicine. In the research I'm doing this year, I spend a lot of time getting to know people and studying them on the whole—what they look like, what they express with their hands as they speak, what they're saying, what they're not saying—and my time at the Blanton has proved to be one of the pieces shaping my new role as a qualitative researcher. (personal communication, July 15, 2018)

In my interview with Dr. Moreno, he stated that the empathy workshop “clicks right away for the students” because, at this point in their curriculum, they are discussing how to communicate with more vulnerable populations (personal communication, July 27, 2018). “Often, the case is that we have the dependent patient, or the angry patient, or vulnerable populations and, sometimes, it's with those very specific patient populations

that you have a really hard time to relate,” he said. “They can put you off with their personality or because society has portrayed them a certain way. I think it is universal that society has these stereotypes, a bias that it is the patient’s fault for their condition. So, the workshop clicks with the students because it makes them aware of how their own implicit biases” (personal communication, July 27, 2018).

Ambiguity: Interpretation and Respect

From the very beginning of the workshops, Ray was quick to tell the students that there was no expectation of expertise as there likely is in their medical courses. “Actually,” he said during his introduction to the first workshop, “I’m hoping that this workshop can *rescue* you from the domain of expertise!” Artwork is inherently ambiguous because there are many viable ways of interpreting the same subject, each of which is worthy of awareness, interest, and respect (Davis, 2012). Throughout my observations and interviews, stakeholders continually pointed out how valuable students’ varying and equally valid interpretations of the artworks were in demonstrating how personal experiences shape our perspective and way of making sense of the world.

During our interview, Ray told me that, “I see some medical students struggle with invitations to be open to multiple interpretative possibilities, and I think there is value in developing these understandings” (personal communication, November 15, 2018). However, there were a few instances in which I directly observed the value that students placed on hearing a variety of responses from their peers and educators. For example, during the Visual Literacy workshop, I observed the students interpreting a painting entitled *St. Jerome in His Study* (c. 16th century) by Marinus van Reymerswaele (Illustration 13).



Illustration 13: Ray leads the students through a discussion of *St. Jerome in His Study* (c. 16th century) by Marinus van Reymerswaele

The students went around the room and described the expression of St. Jerome, not knowing the details of the painting nor who the subject is. The students provided a wide range of descriptive words including confused, pensive, urgent, distracted, focused, drunk, nearsighted, curious, and enraptured. Soon, Ray asked the students to generate some theories as to what is happening in the painting. A few student volunteers provided their unique theories. Then, one student asked about a lion figure in the painting. “The lion is a symbol. It is important that we not only observe this symbol, but we consider how different cultures have different interpretations or meanings behind symbols. What do you all think it could mean?” (personal communication, August 22, 2017). Once again, the students went around the room sharing their interpretations of what the lion might symbolize. Finally, Ray shared with the students a little contextual information about St. Jerome, about his role in Christianity and his appearance throughout art history. Once the conversation concluded, a DOCS Mentor exclaimed, “I just wanted to point out quickly how we all had so many different interpretations, which were all very different

from the story that Ray told us. I just think that's really cool." One student added, "Yeah, showed how many different people's observations can make a more complete story" (personal communication, August 22, 2017).

Furthermore, in several of the interviews, students pointed out the value of hearing their peers' wide-ranging interpretations of artworks. In one interview, a student recalled, "While interpreting the emotion behind the facial expression of a subject in one of the paintings," one student recalled, "there was a wide range of answers from my colleagues. It was a good challenge in drawing inferences.... It was also curious to see how the same image provoked a variety of responses, making me think how physician interactions with a patient with similar circumstances could vary immensely" (personal communication, June 3, 2018). Another student during her interview said, "I was surprised by how thought-provoking my classmates' interpretations were and about all of the hidden meanings in the art that I never would have thought of" (personal communication, July 15, 2018). She added, "This was extremely relevant to our future careers as physicians as we read and interpret visual information on a daily basis (X-rays, sonograms, CAT scans, etc.). Something that is totally obvious to one doctor might not be to another—especially while we're in training" (personal communication, July 15, 2018).

Process Orientation: Inquiry and Reflection

Davis (2008) claims that because art is process-oriented, it builds learners' "ability to ask real questions that lead to further study (inquiry) and the ability to constantly assess, revise, and advance the work (reflection). These essential skills have implications for performance in any area, but are uniquely acquired through the arts in education" (p. 74). While Davis is most specifically referring to the process involved in

art-making, inquiry and reflection also apply to other forms of engagement with art, such as discussion. In both observations and interviews, stakeholders emphasized the value of the arts-based inquiry and reflection exercises in which they engaged as part of the workshops—both in making and discussing the artworks selected for the workshops.

In the Visual Literacy workshop, I observed several moments in which the students considered “whether available information sufficiently answered [their] questions about a work of art” (p. 73) and, if not, the students crafted their own questions in order to draw “the information that [they] recognize as of interest and importance to [them]” (p. 74). For example, during the aforementioned Drawer and Describer activity (detailed in the Tangible Object section above), each of the partners had to engage in this process of inquiry and reflection either as a Drawer making artwork or as a Describer interpreting the artwork (Illustration 14).



Illustration 14: A student, the Describer, considers how to best communicate the details of her chosen painting to her partner, the Drawer.

While reflecting on the activity, one student said, “One challenge for me was determining what details were most important to communicate. I was really focused on the small details that seemed crucial to understanding the painting, but my partner (the Drawer) had to tell me to stop and go back to giving more info about the structure or composition of the painting. It makes total sense because I had the whole image in front of me, so I was able to focus on the details. She didn’t. She needed the big picture first before she could even imagine the details” (personal communication, August 22, 2017). Embedded in the student’s comment was the idea of what Davis (2008) calls “metacognition” or, “thinking about thinking,” in which the student reflected on how, during the activity, the information that she found important about the work of art differed from that of her partner, the Drawer. Furthermore, the Drawer was able to ask other questions in order to draw out the information she needed in order to form her own interpretation of the artwork and continue her drawing.

The student’s comment showed that the activity made her aware of how her “own thinking (process) impacts the art object (the product),” how this process can differ from that of others, and how, when working as a team, she must “engage in a dialogue” with her teammate, “monitoring and adapting their process” to make meaning of the artwork together (Davis, 2008, pp. 73-74). During an interview, one of the students commented on this same activity stating, there was a session where we had to instruct our partner how to draw a specific piece while the other person could not see that piece. I felt this was enlightening in being more mindful of how I communicate certain things, and also more aware of shortcomings in communication and how to improve or adapt when it doesn’t seem to be going well” (personal communication, June 3, 2018). As Davis (2008) says, “meaning is made, found, and negotiated out of just such dialogue” (p. 73).

Throughout each of the workshops, Ray facilitated this process of inquiry by asking the students open-ended questions. “Open-ended questions demonstrate that both questions and answers are most useful when they generate new questions,” Davis (2008) states, “This is the basis of inquiry and more broadly of learning” (p. 73). I observed several occasions throughout the workshop in which students were engrossed in the process of inquiry—asking questions to form interpretations that led to further questions and re-interpretations in this continual process of inquiry and reflection. This was unusual for the students at first, as many of them appeared to want factual information about the artworks rather than to form their own, interpretive meaning. However, with time, the students seemed to embrace the process of asking questions, forming interpretations and narratives behind the works, then asking new questions and reshaping interpretations based on new information. This process, Davis (2008) claims, helps learners to “move beyond factual information” and realize that there might not be “one right answer” as to what the artwork means, that a work of art “can mean different things to different viewers,” and that the student can form “her own meanings out of what the artist has provided” (p. 73).

In interviews, the students expressed the value of engaging in this process of inquiry and reflection in interpreting and forming meaning behind visual information. “The workshops encouraged me to think in ways I don’t normally get to,” one student said in an interview (personal communication, June 3, 2018). Another said, “It shows that, even if you know the perfect treatment for a disease, you must also connect and communicate with the patient for it to matter. The activities that we participated in were effective in putting me into the mindset to ask questions like that” (personal communication, July 8, 2018). Here, the student expresses appreciation for the very dialogue that Davis (2008) encourages in the formation of meaning. The same student

added, “My experience at the Blanton was very positive. It is very important to me to be able to take a step away from medical school, not just to have a life of my own, but to ask different questions” (personal communication, July 8, 2018).

Connection: Engagement and Responsibility

Davis’ (2008) fifth and final unique feature of the arts and arts learning that emerged throughout my observations and interviews with stakeholders is Connection. In the Focus on Emotion subsection above, I describe how stakeholders valued the self-reflection exercises during the Self-Care & Preventing Burnout workshop for strengthening the stakeholders’ connections to themselves and their own internal thoughts and emotions. However, art also facilitates connections to others. “Because of the tangibility of works of art,” Davis (2008) explains, “[viewers] experience connection directly, not just to the work itself, but to the artists who make the work, to the individuals whose stories may be told in the work, and to human beings whom they may never know who have been touched by the work” (p. 76). Davis (2008) argues that this connection to others excites and engages the viewer, “awakening attitudes to learning that include passion and joy, and the discovery that, ‘I care’” and instills “a sense of social responsibility and action because ‘I care for others’” (p. 76). She cites the learning outcomes that result from connection to art as engagement and responsibility.

Stakeholders’ engagement was evident throughout the entirety of the workshop with very few exceptions. I observed the students’ joyful excitement and complete absorption in the drawing activity during the Visual Literacy workshop, in the silent and shared self-reflection exercises during the Self-Care workshop, and finally, during the group discussions and interpretations of various artworks throughout the Empathetic Communication workshop. In my interview with Dr. Moreno, he commented on the

unusually high level of engagement throughout the workshops. “From the beginning to the very end the students were really engaged and it’s really refreshing,” he said, adding, “And that’s rare... You could understand how maybe that would just happen in the first session because it was so new to them and exciting, but actually, their engagement continued like that for all three of the sessions. And with some very difficult topics... You know, like with the two paintings from *Strangest Fruit*, that topic can be uncomfortable for some people, but the students were so engaged!” (personal communication, July 27, 2018).

In my interview with Ray, he agreed that students were highly engaged throughout each of the three workshops. However, in addition to emphasizing the value of the connections the workshops formed within and between the students, Dr. Williams valued the connections the workshops formed to the medical profession. “I think we were successful in getting most students to participate actively and take on part of the responsibility of linking the museum experience to issues in medicine,” he said, adding, “The Blindfold Descriptions in the Observation lesson and the Group Poem activity in the Empathy lesson generated particular delight and energy and the links to the physician skills were clear.... I think these professional connections, in terms of skills and attitudes, are valuable” (personal communication, November 15, 2018). Ray described how much he appreciated the “relevant anecdotes” that faculty mentors contributed during the workshops.

During the Visual Literacy session, I observed one of these anecdotes that formed a connection between the workshop experience and the medical profession. As the students were reflecting on the Drawer and Describer activity, a DOCS Mentor chimed in, “This relates so much to electronic medical record. You’re so busy trying to type up information that you miss important details in seeing or hearing the information that you

patient is giving. It's really important to even just consider where the computer is positioned in the room when you're talking to the patient. Can you see them? If not, you need to move so that you can or else you risk missing something important" (personal communication, August, 22, 2017). I observed another one of these moments during the Empathetic Communication session while the group discussed a work of art entitled *Gold in the Morning* (1985-2000) by Alfredo Jaar. The piece centers on the relationships between consumerism, poverty, and manual labor. Dr. Williams connected the students' discussion of these topics to the medical profession. "So, to reframe this idea within a medical context," Ray said, "this work suggests how important it is to consider the whole story. For example, the whole story of how a patient got there in front of you" (personal communication, April 24, 2018). Siobhan added, "And understanding how a system, a medical system operates and how individuals operate within it" (personal communication, April 24, 2018).

While viewing a sculpture by Luis Jiménez entitled *Cruzando El Rio Bravo [Border Crossing]* (1989), Siobhan reflected on her own personal responses to the work (Illustration 15). "When I first saw this sculpture years ago, I became aware of my own personal bias and my subconscious feelings toward these people," she said, adding, "I thought, 'they're poor, they're border crossers, they're sick, they're bad parents, they're in danger' or, worse, 'they're dangerous'. The intimacy of this moment is so hard to observe. It's so private, so guarded. How does that connect to your profession?" (personal communication, April 24, 2018). One student immediately responded, "It's like the privacy of a medical room. When the patient walks in there and we sit down to review their medical history, there is so much private and personal information that, often times, is so guarded and protected. Or like during an exam, the patient is so vulnerable, or maybe even scared of what the diagnosis is. I can imagine the figures in this sculpture are

afraid of a similar uncertainty, an uncertainty of their future, of their survival” (personal communication, April 24, 2018). By engaging with the artwork, the student not only discovered that he cared for the subjects within the sculpture, but that he cared for all of the people and issues that the sculpture represents.



Illustration 15: *Cruzando El Rio Bravo [Border Crossing]* (1989) by Luis Jiménez.

These moments of connection were not only personal and interpersonal, but *professional*, instilling a sense of social responsibility in the stakeholders as educators, doctors, and students. “Working with this audience and awareness of its specific needs has stretched me as a teacher. I am very motivated to support them in their preparation for work in medicine as I think their patients will end up with better care,” Ray said in an interview (personal communication, May 10, 2018). He added, “I am also very moved by the sometimes debilitating demands of the profession and the opportunity to support these young people in preparing themselves for this important work. I remain committed to the

work and consider it a valuable contribution both to medical education and the field of museum education” (personal communication, May 10, 2018). During my interview with Dr. Moreno, he commented on the workshops’ value to both institutions, “The medical school is very interested in the outcome of these workshops because the vision of the dean is that we teach something different. And although medicine and art has been done in other contexts, I think our approach is unique. For the Blanton, the education programs become even richer, he reaches more people, more students and addresses new needs and gains connections so that he can continue to develop programs that explore the overlaps between art and health—an area of interest to him” (personal communication, July 27, 2018).

Each of the stakeholders I interviewed about the workshops valued these connections made between medicine and art and the renewed sense of engagement and social responsibility these connections instilled. One of the students I interviewed stated, “The sessions at the Blanton are part of our school’s initiative to encourage us to ask, ‘Why is medicine important?’ Going to the Blanton connects what we’re learning and gives it context.... Overall, it was good to reexamine why I chose to go to medical school and the significance of the field I’m entering into” (personal communication, July 8, 2018).

Conclusion

Together, these five themes encapsulate what administrative and student stakeholders perceived as the most valuable aspects of their workshop experiences. In a sense, the administrators and student participants valued the workshop precisely for the features that the arts, and the arts alone, added to the learning experience. As Davis (2008) summarizes, “From imagination to social responsibility, the arts teach our

[students] about what it is to be human and enable them to experience their humanity in thought and in action” (p. 78). This workshop gave students and administrators—both from the Blanton and the Dell Medical School—a much-needed outlet for experiencing and expressing their own humanity and motivation for improving humanity around them. As a result, this research supports Davis’ argument that these five features of the arts—Tangible Product, Focus on Emotion, Ambiguity, Process Orientation, and Connection—are perceived as valuable and, quite possibly essential, to the “education of compassionate, thoughtful, and responsible human beings” (Davis, 2008, p. 51). As humans who work most intimately with other humans, doctors directly benefit from experiences that exercise and develop these humanistic qualities.

While the values were particularly centered on what the students gained from participation in the workshop, my interviews and observations showed that the workshop administrators from both the Blanton and Dell Medical School found their own experience of the program personally and professionally valuable. They, too, learned aspects of themselves, of others, of art and of medicine that could only be offered through such a unique arts-based learning experience such as this workshop series. Furthermore, the perspectives of these administrators were important to this investigation as I was also interested in how they, as educators, perceived the value of these experiences within their students.

However, these five themes neglect to address the value that the stakeholders placed upon the workshop’s museum environment. In other words, I was interested in whether the museum itself added any value to the stakeholders’ experience of the workshop. In investigating this matter, I discovered an answer to my research sub-question: What role does the museum environment play in the stakeholders’ perceptions of the workshop’s value?

“I felt like I was in a part of my own home”: The Value of the Blanton Environment

While arts learning can occur in almost any setting, it goes without saying that there are additional benefits to learning in a space specifically designed for artistic and educational experiences. In addition to discovering how students valued their workshop experiences in general, throughout my observations of and communications with key stakeholders, I also sought information about how they perceived the value of the unique museum environment. I discovered three major themes regarding how they value the museum environment—the space, the objects, and the staff. These factors make the museum environment unique from that which the students had grown accustomed and, therefore, contributed to the students’ perception of the workshop experience as valuable.

The Space

Upon entering the Blanton Museum of Art in late August 2017, two contemporary artworks were immediately visible—*Siphonophora* by Thomas Glassford and *Stacked Waters* by Teresita Fernandez. The atrium was filled with natural light from the large skylight overhead and many people—many of whom were medical students—were walking around the main entrance space. The students were craning their necks upward to get a good view of *Siphonophora* and pressed their hands against the blue ombré tiles of *Stacked Waters* as they mouthed the words, “WOW” and took photos. The students expressed genuine excitement to be at the museum. “I think that the museum environment is essential to this kind of work. It is very different in character from the students’ usual environment, more beautiful and less charged with tension,” Ray explained during an interview (personal communication, May 10, 2018).

With Blanton’s mostly white walls free of visual noise, their absence of background music, exhibition of (mostly) silent objects, and the generally low level of

talking among visitors; museums are reminiscent of libraries, sanctuaries and other spaces in which silent contemplation, reflection, and learning occur. “Upon visiting, I felt a nice sense of calm and relaxation,” one student said during an interview (personal communication, June 17, 2018). Another student said, “I have a hard time expressing how helpful it was to take time and space to be still and contemplate...” (personal communication, August, 2018). She added that she wished that the workshop had spent more time guiding the students on “how to continue to use the Blanton as a place to unwind, contemplate and process through stress and fatigue” (personal communication, August, 2018). “We hoped that the museum environment would be stimulating, freeing, and safe,” Ray stated, “Different from the usual pressures, but relevant” (personal communication, May 10, 2018). The feelings of freedom and safety to which Ray refers are likely the result of the removal from high-stress situations (such as a hospital, clinic, or medical exam) in which they are expected to be the liable experts. By inserting these students into the tranquil and novel museum environment, “Students are able to experience themselves as ‘beginners’ in a non-medical setting, with nothing to prove” (personal communication, May 10, 2018). I would imagine that the resulting feeling is indeed one of relief, of safety, and of comfort.

Secondly, as we moved through the museum, I observed how the galleries aided in the teaching and learning process by acting as physical breaks between activities. This consistent movement and novelty aided in maintaining students’ interest and engagement. In fact, I observed that longer activities in which the students were stationed within a particular gallery or in front of a single work of art for more than 15 minutes caused the students to become restless. Frequent and easily facilitated transitions between spaces typically do not occur in educational settings other than museums. However, it makes sense that those with a medical background would value learning in this type of

environment as it mirrors that of a hospital or physician's clinic where the physician is frequently moving, changing and interacting with new people, spaces, and things. Therefore, in addition to the engagement fostered by connections to artwork, it seemed that transitions throughout and within the galleries were also responsible for maintaining the students' usually high levels of engagement as noted by Dr. Moreno.

Furthermore, the divisions between galleries allowed for a variety of learning experiences—be it large group exercises, small group exercises or individual experiences, the space was able to accommodate a wide range of activity and discussion styles. For example, in the Self-care workshop, students spent much of the time in small groups separated between gallery walls. This division enabled the groups to engage in their own conversations about their assigned artwork without disrupting or distracting from that of another group. After this exercise, the students were tasked to find a work of art that reflected a joy and a struggle that they had personally experienced in medical school. This activity involved independent exploration of the galleries. “We wanted to give you each time to spend time in the galleries on your own, and to explore any works that might’ve caught your eye,” Siobhan said (personal communication, April 10, 2018). The large gallery spaces and multi-level museum enabled the students to actually take space to engage in self-reflection without distraction. Finally, for the sessions conclusion, the students all regrouped by forming a circle around *Townsville* (2000) by Polly Apfelbaum. This ending would not have been possible in any other space nor without direct access to the art object itself, which leads me to my next point: direct exposure to works of art.

The Objects

Ray claimed that, “The activities were designed to make use of the scale and materiality of original works of art, as well as the visual variety and space possibilities of the galleries themselves” (personal communication, November, 2018). I observed this feature in several of the activities I observed including when, during the Self-care session, the students viewed and discussed an artwork entitled *Madame CJ Walker* (2008) by Sonya Clark. When viewing the work up close, the scale is impressive spanning over 10 feet tall and 7 feet wide. The large tapestry is comprised of thousands of black hair combs, some of which are missing teeth, arranged horizontally and vertically in a grid-like pattern. The word “unbreakable” is stamped in black over and over along the thick edges of each comb. However, as one begins to step away from the work, the words and the individual teeth of each comb disappear and, suddenly, a face emerges followed by hair. You discover a portrait of a woman, Madam CJ Walker, something that was impossible to see up close. During the workshop, Ray said, “This work rewards those who take time to view it, who pause and reflect, who try out different perspectives and points of view, who pass by it slowly, and consider its layered possibilities of meaning” (personal communication). Such an experience of a work of art would be impossible without direct, physical exposure to the work itself that allows for viewing from multiple points of view.

In an interview, one student described the feeling that this direct exposure to the artworks gave her over time. “I felt like I was in a part of my own home. I had this strange sense of ownership of the galleries because of how much time I had spent contemplating the meaning of so many of the pieces,” she said, adding that, “They became like friends, in a way, because of how much time we had spent talking about them and trying to discover their meaning” (personal communication, August, 2018).

This direct exposure to works of art gives students a sense of understanding of the artworks on more than just a visual level. “I still have visual and sensory memories from the time I spent there,” one student said in an interview (personal communication, June 17, 2018). When I asked her to clarify what she meant by “sensory memories” she said she remembered the chaotic texture of *Painter & Loid Struggle for Soul Control* (2001) by Trenton Doyle Hancock during the Self-Care session. When asked, she said she felt it would have been impossible to capture the texture of that piece through a photographic reproduction of the work and a significant amount of the work’s meaning would have been lost along with the meaning of the workshop activity (personal communication, June 17, 2018).

The Staff

According to Ray, “The Blanton’s mission is to serve student learners from a wide range of disciplines through encounters with original works of art. We have a special commitment to UT students, and an interest in developing and sharing innovative approaches to the museum field” (May 10, 2018). In fulfillment of its mission, the Blanton hires museum educators with vast experience and knowledge in art history and museum education. In our interviews, Dr. Moreno emphasized the unique and highly sought-after specialization that Dr. Williams possesses. “Ray has all the badges. Not only is he an expert in art history and museum education, he is also a pioneer connecting his field to medical education. He started the very first medicine arts course when we was in Boston, working with Dr. Joel Katz, one of the sacred cows of Internal Medicine at Brigham and Women’s Hospital,” Dr. Moreno explained (personal communication, July, 27, 2018). “Dell’s innovative curriculum emphasizes humanism and many of us in the faculty benefitted from arts and music courses throughout our own training, so we knew

we wanted our students to have the same experience. So, when we heard that Ray was here, it was obvious that our students would benefit by working with him” (personal communication, July 27, 2018).

Because of his extensive knowledge of the Blanton’s permanent collection and his experience working in public museum settings, Ray understood the need for balance between information and personal connection—something even experienced art educators struggle to achieve (Burnham & Kai-Kee, 2011). “Museum education staff brings a wealth of information about specific works of art that they can draw on as needed to support the conversation,” Ray explains, “but they need to be ever mindful of the particular goals and needs of this audience: medical students” (personal communication, November, 2018). His experience working with medical students and faculty enhanced his ability to form and communicate the connections between ideas presented in art and medicine, clarifying the workshop’s relevance to the medical students.

The students valued the opportunity to work with Ray and Siobhan, emphasizing their “soothing, calming, inviting demeanor” and understanding of the medical field (personal communication, June 15, 2018). In an interview, one student said, “I wish I had the educators with me every museum visit,” because the educators acted as “vessels for our thoughts and ideas rather than teachers” (personal communication, June 17, 2018). I observed moments in which the students wanted factual information about the artworks in order to gain knowledge and understanding about the art historical subject, but there were also moments in which I observed the students wanting their subjective experiences and emotions to be encouraged, nurtured, and welcomed. Achieving this balance is not easy, but a task for which experienced art museum educators such as Ray and Siobhan are best suited.

Conclusion

In this chapter, I shared my analysis of key stakeholders' perceived value of their workshop experiences. These values mirror Davis' (2008) five unique features of art education—Tangible product, Focus on emotion, Ambiguity, Process orientation, and Connection. Therefore, I utilized her framework for organizing, supporting and interpreting the raw data recounted within this chapter. To conclude, I also interpreted how the stakeholders' valued the Blanton's unique environment as part of their workshop experience.

The analysis recounted in this chapter primarily addresses my main central research question: How do key stakeholders perceive the value(s) of a collaborative art museum workshop for medial students? However, I was also interested in how these findings supported the value and relevance of the Blanton Museum of Art within its local Austin community—this question I address separately at the end of this chapter.

Chapter 6: Conclusion

THE MUSEUM & SOCIETAL WELL-BEING

Each session, as we gathered directly beneath Thomas Glassford's *Siphonophora* (2016) in the Blanton's lobby (Illustration 16) and I looked up at the dangling white forms resembling what Arozqueta (2016) describes as "leaf-like protruding shapes, little stalks, or trailing tentacles," I wondered why this gigantic forty-nine-foot-long piece was chosen to suspend to suspend "discretely, but elegantly" within the Blanton's light-filled atrium. As I gathered and analyzed my research of this workshop (and also conducted a little research into marine research into marine biology), I could not help but form connections between the sculpture, the workshop, its participants, the museum, the medical school, and the community that contains them all.



Illustration 16: *Siphonophora* (2016) by Thomas Glassford in the Blanton Museum of Art atrium.

“Members of Siphonophora (siphonophores) are colonial animals of great complexity,” as Pugh and Baxter (2014) of the School of Ocean and Earth Science explain, “They are characterized by the morphologically diverse nature of their component individuals (zooids), in which each is specialized to perform a particular function and alone would not be able to survive” (p. 1). The words “survival,” “function,” “diverse,” “individuals,” “colonial,” “specialized,” and “complexity,” resonated with me. Finally, I understood the connection.

Like zooids, we humans rely on those around us to survive. We fulfill our specialized functions in order to contribute to our own survival and those we care about—our families, our friends, our community. We are complex, as unique individuals who comprise diverse communities, operating together in harmony and doing our best to address and alleviate inevitable discord. But what is the museum’s role in all of this? That was a question that kept cropping up again and again throughout my research. As I read Pugh and Baxter’s (2014) scientific description of Siphonophora, I recalled the quote from John Cotton Dana’s *The New Museum* (1917a), in which he imagines future museums as follows:

...living organisms, with an abundance of teachers, with ample workshops, classrooms and spaces for handling the outgoing and incoming of objects which they lend... the experts will use their expertness partly on objects, as now; but they will sweeten much of it generously with the simple syrup of sympathy and use it for the pleasure and profit of the common man. (p. 19)

Does Dana’s (1917a) description not invoke the image of siphonophores? Here we were, a group of art educators, museum staff, medical faculty, and medical students with a wide range of personal and professional backgrounds, knowledge, and understandings of the world forming connections between two disparate, but interrelated fields—art and science—and each other, all within one workshop experience. And the environment that

supported this thriving ecosystem of meaningful learning was The Blanton Museum of Art. This metaphor, while not the primary concern of my central research question, helped me to understand the “bigger picture” of what this workshop and the experiences of those involved—the key stakeholders—means, influencing my interpretations and informing my own perspective surrounding my analysis of this research.

While this study focused on how students and administrators valued one particular art museum workshop, at its core, this thesis tells the story of unique and complex individuals working together to ensure that their community functions and survives optimally, harmoniously, and healthfully. From my investigation, I determined that the Blanton and, more specifically, Ray’s educational programming embodies what Dana (1917a) imagined and what, more than 70 years later, Stephen Weil (1990) described as the “Emerging New Paradigm” (p. 74). The workshop and its perceived value to its stakeholders reflects how Ray has embraced what Munley and Roberts (2006) describe as the role of the new generation of museum educators:

The competent museum educator, the standards document declares, promotes the wide public service role of museums within our changing society and develops and maintains sound relationships with community organizations, schools, cultural institutions, universities, other museums, and the general public. It is the responsibility of the educator to reflect the needs and complexities of a changing society by shaping content and interpretation toward relevant issues and creating broad, informed, and respectful dialogue among citizens. The set of standards calls on museum educators to move beyond understanding audience needs to understanding community needs. It calls on museum educators to move beyond knowing content and pedagogy to understanding the full range of institutional resources available and to craft them into experiences and partnerships that result in an improved quality of life for individuals and communities. (pp. 36-37)

In short, my investigation tells the story of one museum educator who is addressing a dire need, establishing the museum’s relevance and value to its visitors in need and, in doing

so, improving the quality of life for not only individuals, but for its entire community and beyond.

OVERVIEW OF THE STUDY

This research examined how participants and administrators valued their experience of a workshop at the Blanton Museum of Art designed for first-year students of the Dell Medical School. In response to increasing rates of burnout, poor patient care, healthcare costs, and declines in physical diagnosis abilities among medical students and practicing physicians, many medical institutions have begun to implement arts-based learning strategies to foster humanism in their students and physicians. Through a variety of activities and discussions led by highly experienced art museum educators, the Blanton Museum of Art's three-part workshop series aims to develop first-year medical students' skills in visual literacy, self-care, and empathetic communication—areas that the Dell Medical School determined were very much in need of attention among medical students and future doctors.

Data gathered from firsthand observations of the workshops as well as interviews with key stakeholders revealed five themes present in how participants and administrators valued the workshop experience within the museum environment. The workshops offered stakeholders the chance to experience features that the arts uniquely offer—Tangible product, Focus on emotion, Ambiguity, Process orientation, and Connection (Davis, 2008). From these features, the stakeholders valued the opportunity to exercise and develop imagination and agency; expression and empathy; interpretation and respect; inquiry and reflection; and engagement and responsibility that the workshop presented. Furthermore, inductive analysis revealed that the stakeholders perceived the museum's space, objects, and staff as directly connected to the value and success of the program.

Research Problem

The problems this research addresses are not only relevant to the fields of medical and art education, but to humanity as a whole. Problems plaguing medical education and practice include physician burnout, erosion of empathy, and declines in physical examination skills. Currently, there is little qualitative data supporting the value or effectiveness of visual arts-based teaching methods in helping to solve these problems. This research shows that students perceive art museum programs aimed at addressing these problems as valuable learning experiences that uniquely contribute to their future careers as physicians.

Additionally, this study addresses problems in the perception of art's relevance to non-arts subjects and audiences. This perception contributes to steady declines in government arts funding, including within art museums. Within the current political climate, there is a pervasive belief that the arts are not as necessary or relevant as other subjects such as math and science. However, this thesis helps to clarify the value of art museum experiences to a non-traditional audience: medical students.

Furthermore, this thesis addresses issues relevant to all humans: rising problems in healthcare. Because all humans require healthcare of some sort, it is vital we understand the risks of letting the aforementioned problems—increased burnout, empathy erosion, and declines in visual literacy—go unaddressed. This investigation has aimed to call attention to these problems, shed light on their relevance to all communities, help clarify the needs of our healthcare providers, and demonstrate how one public art museum is serving the needs of these future physicians and supporting their efforts to provide the best possible healthcare to their community.

Central Research Question

The central research question that initiated this study was: How do key stakeholders perceive the value of a collaborative art museum workshop for medical students? What role does the museum environment play in the stakeholders' perceptions of the workshop's value? Throughout the course of my investigation, I referred back to this question in an effort to guide my investigation and focus my thinking.

Research Approach

This investigation employed a qualitative narrative case study research design. Drawing from social constructivist theory (Creswell, 2014; Young & Collin, 2004), I sought to evaluate how key stakeholders made meaning and valued their experiences of an art museum workshop. My research design involved firsthand observations and interviews with key stakeholders—the primary methods for narrative and case studies—utilizing voice recordings, field notes, and photographs throughout each of these data collection phases. Employing an evolving coding technique that combined both prescribed and emergent themes in my close readings of qualitative data, and augmenting these thematic categories with my own interpretation of firsthand observations, I worked to uncover five unique findings from this research relating to how stakeholders valued the workshop experience within the museum setting.

Limitations & Recommendations for Future Research

While the findings of this thesis are intriguing and unique due to the fact that they focus on the perspective of a variety of stakeholders, I discovered several limitations and avenues for further research throughout my investigation. One limitation in this research is the reliance on qualitative and heavily self-reported methods. Because participants in the research were either students or employees of the institutions involved in the workshops, it is possible that the study participants felt bias. As stakeholders in the

workshop, their perception of its value and success is beneficial to them as it supports the idea that they are effectively accomplishing their goals as learners and/or educators. In order to reduce this stakeholder bias, it would be beneficial to utilize a mixed-methods approach in a similar investigation and strengthen the validity of its findings.

Due to the limitations in time for this investigation, I was only able to observe the first of three groups of first-year students to participate in the workshop in its second year. As a result, I observed the same 15 students, 3 mentors, and 2 educators, from which I sampled interview participants. It would be both interesting and useful to see whether my findings would be supported in a study of the entire 50 students. Furthermore, it would be of benefit to the Blanton Museum of Art and to the Dell Medical School to study how stakeholders perceive the value of the program throughout their medical careers. Due to the newness of research in this area, there is little existing literature supporting the long-term effects of arts-based interventions like the Blanton's workshop.

Another recommendation would be to investigate how the program changes over time in order to accommodate changes in the exhibited artworks, environment, and needs of the medical education audience. Such a study could also conduct interviews and observations to garner information about how stakeholders' valuations of the program change across time and how their valuations might be affected by the changes that occur each year. While the administrators of the program are likely to remain consistent, the new cohort of first-year students each year would give the institutions a large population from which to draw findings.

I would be interested to know how physicians and other healthcare practitioners who have already completed medical school perceive the workshop's value. While this particular workshop is currently geared toward University audiences, Ray is interested in

expanding the Blanton's current educational offerings to practicing healthcare professionals. A pilot study investigating how these trained professionals perceive and value the program would be of benefit to the Blanton as they consider this programmatic expansion and enhance our understanding of this interdisciplinary topic.

Furthermore, a study investigating the workshop's value to other students and professionals in other areas of healthcare—dentistry, nursing, pharmacy, etc.—would greatly contribute to this area of research and benefit the fields of medical and art education. This study could be structured as a single case study or, perhaps, a comparative case study analyzing the findings between two different programs for two different medical groups. Implementing more workshops for different areas of healthcare would greatly expand the Blanton's reach and likely, as a result, the perception of institutional relevance and commitment to the community they serve.

Conclusion

The work that Ray and other museum educators have begun to implement in collaboration with healthcare professionals and students is vital to the health of our communities and society. Caring for and attending to the health and professional needs of our medical students and practitioners improves their ability to care for and attend to the health of their patients. Because all humans require healthcare, these efforts have the potential to affect not only our local communities, but society at large. Like Ray, I admire and believe in this group of young students and the important work that they do. Our world needs doctors, but more importantly, our world needs attentive, caring, and compassionate doctors; art museums can help.

Appendix A: Site Approval Letter

September 17, 2017

Dr. James Wilson, Ph.D.
Chair, Institutional Review Board
P.O. Box 7426
Austin, TX 78713
irbchair@austin.utexas.edu

Dear Dr. Wilson:

The purpose of this letter is to grant Carolyn Claire Anderson, a graduate student researcher at the University of Texas at Austin permission to conduct research at The Blanton Museum of Art. The project, “Art As Medicine: A Narrative Case Study of an Art Museum Workshop Series for First-Year Medical Students” entails an examination of the three museum workshops occurring throughout Fall 2017 and Spring 2018. Data will be collected at the museum in Austin, Texas through observation, interviews with key administrators and student participants, and collection of anonymous questionnaires to be distributed to the participating students. No more than 4 students of the Dell Medical School, 1 faculty of the Dell Medical School, and 1 member of education staff of the Blanton Museum of Art will be included as interview subjects. The Blanton Museum of Art was selected because of the institution’s innovative collaboration with the Dell Medical School aligned with the researcher’s interests in art intervention in medical education. Miss Anderson has been in communication with me since August 2017, but she has no professional or personal relationship with the museum beyond the context of this research. I, Dr. Ray Williams, do hereby grant permission for Carolyn Anderson to conduct her project, “Art As Medicine: A Narrative Case Study of an Art Museum Workshop Series for First-Year Medical Students” at the Blanton Museum of Art.

Sincerely,

A handwritten signature in cursive script that reads "Ray Williams".

Ray Williams

Director of Education and Academic
Affairs, Blanton Museum of Art

Appendix B: IRB Exempt Determination



OFFICE OF RESEARCH SUPPORT

THE UNIVERSITY OF TEXAS AT AUSTIN

*P.O. Box 7426, Austin, Texas 78713 · Mail Code A3200
(512) 471-8871 · FAX (512) 471-8873*

FWA # 00002030

Date: 01/10/18

PI: Carolyn Anderson

Dept: Art/Art History

Title: Art as Medicine: The Impact of an Art Museum Program on
First Medical Students' Visual Literacy, Empathy, and
Mindfulness

RE: Non-Human Subjects Research Determination

Dear Carolyn Anderson:

The Office of Research Support (ORS) reviewed the above protocol submission request and determined it did not meet the criteria for human subjects research as defined in the Common Rule (45 CFR 46) or FDA Regulations (21 CFR 56). IRB review and oversight is not required because the activities involve:

- ☐ No human interactions
- ☐ Classroom activities used to teach methodology and technique
- ☒ Program evaluation where results are not generalized to other services or programs
- ☐ Secondary use of de-identified data set (no direct or links to identifiers)
- ☐ Obtaining information that is not about living individuals
- ☐ Obtaining information from publicly available sets
- ☐ Biographical research that is not generalizable beyond the individual
- ☐ Archival research using existing literature
- ☐ Other (Explain):

At this time you are free to begin your research as IRB approval is not necessary. You should retain this letter with the respective research documents as evidence that IRB review and oversight is not required.

If you have any questions contact the ORS by phone at (512) 471-8871 or via e-mail at orsc@uts.cc.utexas.edu.

Sincerely,

A handwritten signature in cursive script that reads "James P. Wilson".

James Wilson, Ph.D.
Institutional Review Board Chair

Appendix C: Consent for Participation in Research Form

Consent for Participation in Research

Title: The Art of Medicine: A Narrative Case Study of an Art Museum Workshop Series for First-Year Medical Students

Introduction

The purpose of this form is to provide you information that may affect your decision as to whether or not to participate in this research study. The person performing the research will answer any of your questions. Read the information below and ask any questions you might have before deciding whether or not to take part. If you decide to be involved in this study, this form will be used to record your consent.

Purpose of the Study

You have been asked to participate in a research study investigating the experiences of key stakeholders involved in a workshop at the Blanton Museum of Art for first-year medical students of the Dell Medical School at The University of Texas. This study aims to investigate how key stakeholders value their experience of the workshop and what role the museum plays in their perception of its value.

What will you be asked to do?

If you agree to participate in this study, you will be asked to

- Participate in a semi-structured interview regarding your experience of the workshop at any and all stages of your involvement.
- Verify and potentially clarify your responses to interview questions.

This study will take one hour for participation, one time in one year and will include approximately five study participants.

Your participation will be audio recorded.

What are the risks involved in this study?

There are no foreseeable risks to participating in this study.

What are the possible benefits of this study?

Note: If the study has direct benefits (monetary compensation cannot be categorized as a benefit) include this statement:

The possible benefits of participation are recollection and enhancement of learning that occurred during the workshops.

Do you have to participate?

No, your participation is voluntary. You may decide not to participate at all or, if you start the study, you may withdraw at any time. Withdrawal or refusing to participate will not affect your relationship with The University of Texas at Austin (University) in anyway.

If you would like to participate, please sign and return a physical or electronic copy of the form to the Principal Investigator, Carolyn Anderson (callie.anderson@utexas.edu). You will receive a copy of this form.

Appendix C (continued): Consent for Participation in Research Form

Will there be any compensation?

You will not receive any type of payment participating in this study.

How will your privacy and confidentiality be protected if you participate in this research study?

The privacy and the confidentiality of all physical data will be protected by a locked file cabinet and by encryption for all digitized data. Participant confidentiality will be maintained by the utilization of randomly assigned letters in my thesis, rather than names. Data will be destroyed within one year of the completion of this study (August 2019). All physical documents will be shredded and all digital files will be deleted.

If it becomes necessary for the Institutional Review Board to review the study records, information that can be linked to you will be protected to the extent permitted by law. Your research records will not be released without your consent unless required by law or a court order. The data resulting from your participation may be made available to other researchers in the future for research purposes not detailed within this consent form. In these cases, the data will contain no identifying information that could associate it with you, or with your participation in any study.

If you choose to participate in this study, you will be audio recorded. Any **audio** recordings will be stored securely and only the research team will have access to the recordings. Recordings will be kept for three months and then erased.

Whom to contact with questions about the study?

Prior, during or after your participation you can contact the researcher **Carolyn Anderson** at **817-781-4906** or send an email to **Callie.anderson@utexas.edu** for any questions or if you feel that you have been harmed.

Whom to contact with questions concerning your rights as a research participant?

For questions about your rights or any dissatisfaction with any part of this study, you can contact, anonymously if you wish, the Institutional Review Board by phone at (512) 471-8871 or email at **orsc@uts.cc.utexas.edu**.

Participation

If you agree to participate, please sign and return a physical or electronic copy of the form to the Principal Investigator, Carolyn Anderson (**callie.anderson@utexas.edu**). You will receive a copy of this form.

Signature

You have been informed about this study's purpose, procedures, possible benefits and risks, and you have received a copy of this form. You have been given the opportunity to ask questions before you sign, and you have been told that you can ask other questions at any time. You voluntarily agree to participate in this study. By signing this form, you are not waiving any of your legal rights.

Printed Name

Signature

Date

As a representative of this study, I have explained the purpose, procedures, benefits, and the risks involved in this research study.

The University of Texas at Austin
Institutional Review Board – Revised August 2015

Page 2 of 3

Appendix C (continued): Consent for Participation in Research Form

Print Name of Person obtaining consent

Signature of Person obtaining consent

Date

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